CALIFORNIA COASTAL COMMISSION
South Coast Area Office
200 Oceangate, Suite 1000
Long Beach, CA 90802-4302
(562) 590-5071

November 2, 2000

TH9a

TO: Commissioners and Interested Persons

FROM: Deborah Lee, South Coast Deputy Director
Teresa Henry, South Coast District Manager
Steve Rynas, Orange County Area Supervisor

SUBJECT: **Bolsa Chica Local Coastal Program (LCP), Land Use Plan Amendment No. 1-95/ Implementing Actions Program.** (For Public Hearing and Possible Adoption at Coastal Commission Hearing of November 14-17, 2000)

EXECUTIVE SUMMARY

SUMMARY

The planning effort for Bolsa Chica has had a long controversial history. The Commission started considering the Bolsa Chica LCP in early 1982. The Commission's first approval of the Bolsa Chica Land Use Plan (LUP) occurred in November 1984. On October 23, 1985 a revised land use plan was adopted which would have allowed for intensive development of the area consisting of 75 acres of mixed-use marina/commercial, visitor serving facilities such as a 150 room motel, 500 acres of high density residential development, a navigable tidal inlet, an arterial roadway through the Bolsa Chica Wetlands, and 915 acres of wetland restoration. This controversial proposal was never implemented. In June 1995 the County of Orange submitted an amended proposal of the Bolsa Chica Local Coastal Program (LCP) for Commission certification. As submitted in 1995, the Bolsa Chica LCP would have allowed for homes, associated infrastructure, public recreational facilities, and wetland restoration. Specifically, the County of Orange proposed to designate approximately 190 acres in the lowlands for development, primarily residential development with up to 900 units. The Bolsa Chica Mesa was designated for development with up to 2,400 units which included elimination of Warner Pond. The Commission approved this scaled down version of the Bolsa Chica LCP on January 11, 1996. The Commission's decision became the subject of a lawsuit.

The Trial Court determined on June 4, 1997 that the Commission's approval of the Bolsa Chica LCP was deficient in two respects. First, that Section 30233 of the Coastal Act does not allow the fill of wetlands for residential purposes. Second that Warner Pond, an approximately 1.7 acre wetland on the Bolsa Chica Mesa, was an environmentally sensitive habitat area (ESHA) and that the Commission failed to explain how such an

ESHA could be filled consistent with Section 30240 of the Coastal Act. The Trial Court remanded the Bolsa Chica LCP to the Commission. The Commission reheard the Bolsa Chica LCP on October 9, 1997.

At the Commission's October 9, 1997 meeting, significant revisions were made to the plan as originally submitted in June 1995. The Commission found in October 1997 that the fill of wetlands for residential development was not an allowable use and denied the development proposed in the lowland area. Residential development of the Mesa was also scaled back to 1,235 residential units to avoid the widening of Warner Avenue which would have resulted in the fill of Warner Pond. Since lowland residential development was denied, the proposed wetland restoration project was also deleted from the Bolsa Chica LCP since it was to be funded by the developer through the lowland residential development. Furthermore, the wetland restoration program became moot since the majority of the lowland (880 acres) was acquired on February 14, 1997 by the State of California. The State and Federal governments are now developing a wetland restoration program covering 1, 247 acres of the lowland. An EIR/EIS on the wetland restoration program was prepared in July 2000 and released for public review.

The Commission's October 9, 1997 decision was appealed. On April 16, 1999, the Appellate Court upheld the trial courts findings, added a new finding and remanded the Bolsa Chica LCP back to the Commission. The new finding of the Appellate Court was that the relocation of the Eucalyptus grove from the Bolsa Chica Mesa to the Huntington Mesa was not allowed under Section 30240 of the Coastal Act. To comply with the Appellate Court's remand, the Commission is once again re-hearing the Bolsa Chica LCP. Since the lowland area has been acquired by the state of California, for purposes of future restoration, the Commission's focus will be the development potential of the Mesa.

SUMMARY OF STAFF RECOMMENDATION

Commission staff recommends that the Commission adopt the findings of this staff report **DENYING** the proposed Land Use Plan Amendment and Implementing Actions Program for Bolsa Chica as submitted, and **APPROVING** the proposed local coastal program for Bolsa Chica as modified. There are motions and resolutions that the Commission will need to adopt beginning on page 31.

CONDENSED STAFF RECOMMENDATION

- **Residential development** on the Mesa limited to the upper bench of the Bolsa Chica Mesa and a total of 1,235 residential units. Figure 1 on page 5 graphically depicts the staff recommendation. Residential development is limited to the upper bench of the Mesa in order to concentrate development in close proximity to existing development and conserve all of the resources on the lower bench of the mesa in a manner that is more protective overall of significant coastal resources than protecting each specific habitat area in conjunction with development of the entire mesa.

- **Lower Bench of the Bolsa Chica Mesa** designated as Conservation except for an area next to Warner Avenue and the Ecological Reserve to be designated as a school site. This preserves Warner Pond, wetland #2, and most of the Eucalyptus grove ESHA in place.

- **Buffers**. A buffer is designated from the portion of the bluff-top overlooking the lowland for one-hundred feet inland from either the Eucalyptus grove ESHA or the inland from the edge Bolsa Chica blufftop, whichever is the greatest distance. The upper bench of the Bolsa Chica will be separated from the lower bench by a fifty foot buffer located on the upper bench. Figure 1 on page 5 graphically depicts the buffers.

- **Storm water outfalls** prohibited from discharging directly into Outer Bolsa Bay or other wetland areas.

- **Scenic public road** paralleling the portion of the upper bench of the Bolsa Chica Mesa overlooking the lowlands will be provided immediately inland of the buffer.

- **Public access** and recreation opportunities to be enhanced through the establishment of a public trail system. The public access trail system is depicted in Figure 1 on page 5 graphically depicts the staff recommendation. Public trails will be allowed within the buffer separating the residential development from conservation areas. The public trail from Warner Avenue to the Department of Fish and Game overlook will be kept open. The availability of the public amenities is to be guaranteed by the requirement that they be dedicated as a condition of subdivision approval and that they be improved concurrent with the construction of the scenic roadway and open to the public prior to the issuance of the first coastal development permit for residential construction.

- **Land form alterations minimized**. No grading will be permitted in Conservation areas. Only native plants can be planted in Conservation areas.

- **Archeological and Paleontological resources protected** by requiring that a survey be conducted prior to the submission of an application for a coastal development permit to subdivide an area that contains resources to assure that the impacts of proposed development on archeological and paleontological resources can be properly evaluated. Furthermore, the LCP will require that a research design be submitted at the time of permit application for development within areas that contain resources. The LCP will also require that a County certified field observer and Native American monitor be present at all grading activities to verify that archeological and paleontological resources, if uncovered, are not damaged.

- **Fieldstone[1] property designated "Conservation"** (Planning Area 10, as submitted). The location of the former Fieldstone parcel (which is now owned by Hearthside Homes) is shown on (Figure 4) (page19). This area was deferred certification at the Commission's October 9, 1997 hearing, as the Fieldstone Corporation owned it at the time. The property was subsequently acquired by Hearthside Homes on September 30, 1997, the principal landowner for the Bolsa Chica Mesa.

- **Prohibit residential development in Planning Area 11** which is part of the lowland now under State ownership. The state lands will be part of a future wetland restoration program governed by the Chapter 3 policies of the Coastal Act. The location of Planning Area 11 is shown on Figure 3 (page 16) and will be designated as Conservation.

- **Edwards Thumb** (Planning Area 1D, approximately 51 acres) Conservation designation maintained. Designated by the County of Orange as Conservation in the original submittal of June 1995. The location of Edward's Thumb (Planning Area 1D) is shown on Figure 3 (page 16).

- **Deletion** of the Wetland Restoration Program and the Bolsa Chica Development Agreement from the Bolsa Chica LCP.

The staff recommendations presented above are a summary. Detailed changes to the Bolsa Chica LCP, as submitted, are contained in the sections of the staff report titled "*Land Use Plan Modifications*" and "*Implementation Program Modifications*". A graphic (Figure 1) depicting the staff recommendation is located below.

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[1] The Fieldstone property was bought by Hearthside Homes on September 30, 1997. Though the property is no longer owned by Fieldstone, this property continues to be referred to by that name in numerous documents such as the recently released Draft EIR/EIS for the Bolsa Chica Lowlands Restoration Project. This report will follow this convention, even though the property (Planning Area 10) is now owned by Hearthside Homes.

Figure 1: Bolsa Chica Staff Recommendation

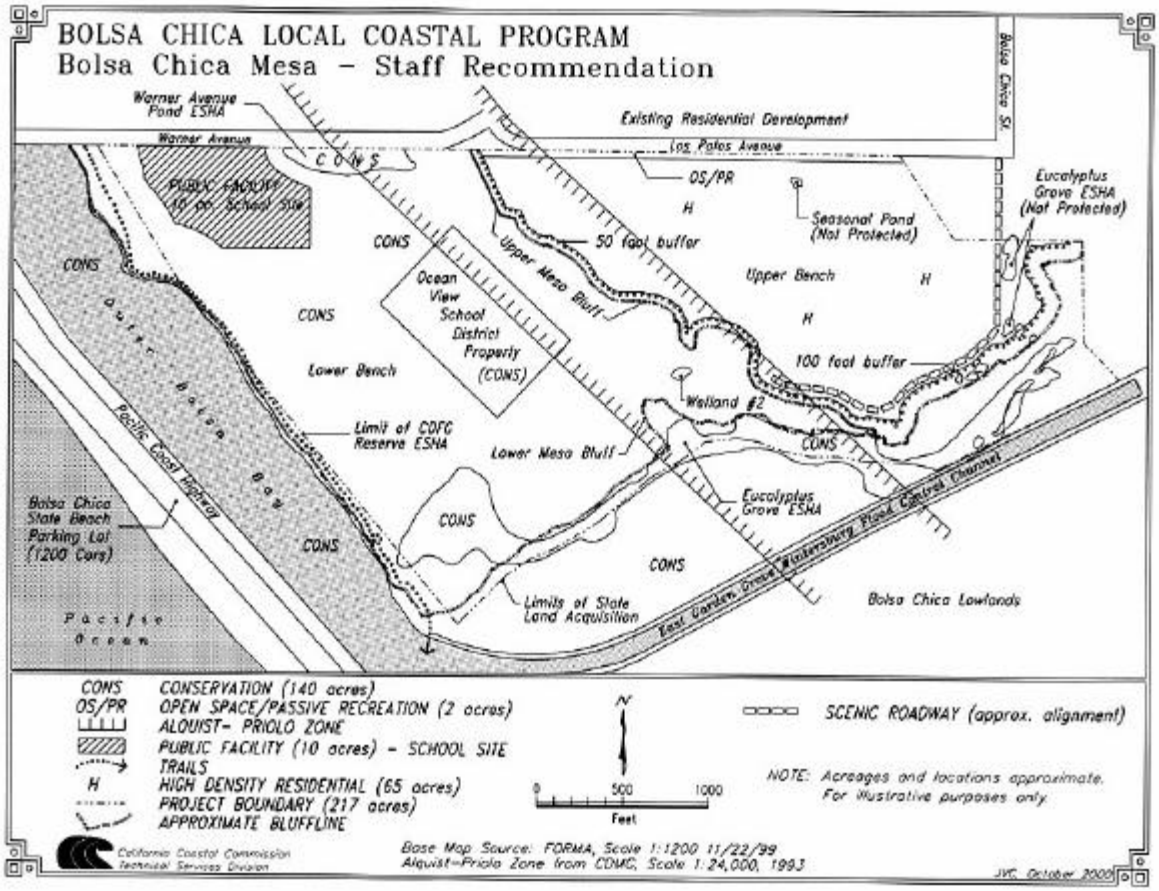
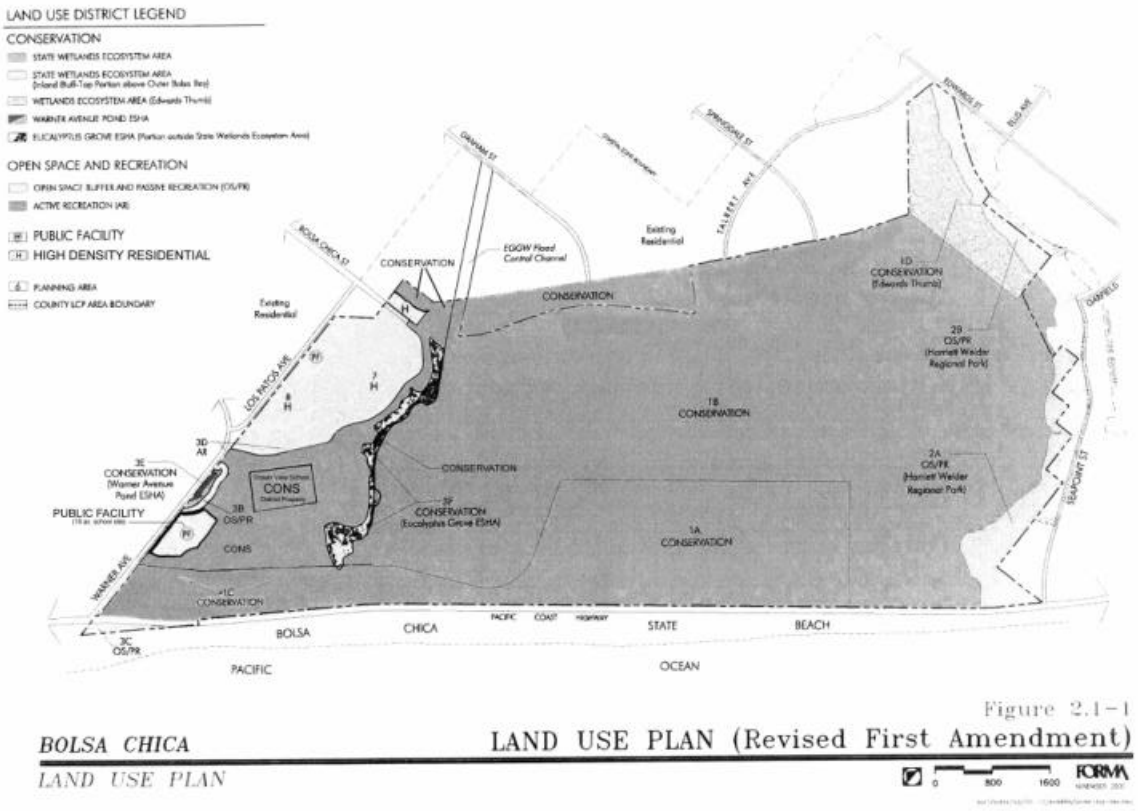


Figure 2: Bolsa Chica Land Use Plan As Modfied To Conform to the Staff Recommendation



ANTICIPATED AREAS OF CONTROVERSY AND SUMMARY OF SUGGESTED MODIFICATIONS RELATED TO CONTROVERSIAL ISSUES

Staff believes that the staff recommendation with suggested modifications results in the Bolsa Chica Local Coastal Program conforming to the provisions of the Coastal Act, and the direction provided by the courts. Nevertheless, based on discussions with the County of Orange, the major landowner, public interest groups, and concerned citizens, staff is aware that controversy remains over a number of issues. Staff anticipates that the following topics will be raised at the Commission meeting. Additional narrative concerning anticipated areas of controversy can be found starting on page 25.

TOPIC	STAFF RECOMMENDATION

RESIDENTIAL DENSITY	To preserve Warner Pond, the Commission imposed a residential cap of 1,235 residential units at its October 9, 1997. Under the 1997 Commission decision, residential development would have occurred on both the upper and lower benches of the Mesa. Commission staff is recommending that this residential cap of 1,235 residential units be maintained. However, in this case Commission staff is recommending that residential development be limited to the upper bench of the Bolsa Chica Mesa. Warner Pond will not be filled.
WETLAND PROTECTION	The fill of wetlands can only be allowed if it is consistent with Section 30233 of the Coastal Act. Consequently, the fill of wetlands to facilitate the construction of residential development is not an allowed activity. Under the 1997 Commission decision, lowland residential development was denied. Since the submittal of the LCP in 1995, new wetland delineations have been conducted. The new wetland delineations have resulted in the elimination of four sites as wetlands and the discovery of a new seasonal wetland by Los Patos Avenue. Staff recommends that residential development be concentrated on the upper bench of the Bolsa Chica Mesa and the lower bench of the Mesa be designated as Conservation. Even though concentration of development on the upper bench in close proximity to existing developed areas and conservation of resources on the lower bench will necessitate the fill of the seasonal wetland by Los Patos, this conflict between concentrating development and filling a wetland is resolved in a manner that is more protective overall of significant coastal resources than protecting each specific habitat area in conjunction with development of the entire mesa. Additionally, staff recommends that Warner Pond not be used as retarding basins for urban runoff resulting from the residential development.
ESHA PROTECTION	Section 30240(b) of the Coastal Act states that development adjacent to ESHAs shall be sited and designed to prevent impacts which would significantly degrade an ESHA. The lower bench of the mesa contains significant ESHA. ESHA areas function cooperatively with non-ESHA areas as an

	ecological unit. Commission staff recommend that the lower bench of the Bolsa Chica Mesa be designated as Conservation except for a 10 acre school site. Residential development will be concentrated on the upper bench of the Bolsa Chica Mesa to minimize significant adverse impacts to the ESHA on the lower bench as well as the adjacent non-ESHA areas on the lower bench that provide an ecological link to the ESHAs.
MESA COMMUNITY PARK	Section 30240 requires that ESHAs be protected and that development adjacent to ESHAs shall be designed to prevent impacts which would significantly degrade the ESHA. The site of the Mesa Community Park is ecologically important as a wildlife corridor connecting the Warner Pond ESHA to the remaining ecosystem. Section 30251 of the Coastal Act requires that landform alteration be minimized. The creation of the Mesa Community Park would result in extensive landform alterations that would significantly disrupt habitat values. To preserve the ecology of this area staff recommends (consistent with the Conservation land use designation) that the area be left as it currently exists.
SCHOOL SITE	The Ocean View School District owns fifteen (15) acres in the center of the lower bench of the Bolsa Chica Mesa. Commission staff has recommended that the lower bench of the Bolsa Chica Mesa be designated as “Conservation”. Designating the School District’s property as “Conservation” would leave it with property that could not be developed except for conservation uses. To reconcile the necessity that the Ocean View School District have the ability to construct a school, Commission staff recommends that a ten (10) acre school site next to Warner Avenue and the State Ecological Reserve owned by the Master Developer be designated as “Public Facility” (Figure 1 on page 5).
LAND FORM ALTERATIONS	Section 30251 of the Coastal Act requires that landform alteration be minimized. Further Section 30253 requires that development be sited in a manner that minimizes risks to life and property. Staff recommends that grading be allowed in areas designated for residential development. However, in areas designated for Conservation, grading will only be allowed for allowable conservation uses in order to minimize natural landform alteration consistent with Section 30251.

PROTECTION OF ARCHEOLOGICAL RESOURCES	Section 30244 of the Coastal Act requires that where development would adversely impact archeological or paleontological resources that reasonable mitigation be provided. Staff recommends that the archeological and paleontological policies of the Bolsa Chica LCP as submitted be modified to require that studies be completed and submitted before an application is made for a coastal development permit for development, including any proposed subdivision, to evaluate the impact of the proposed development on archeological and paleontological resources. Staff also recommends that a research design be submitted at the time of permit application for development within areas that contain resources. In addition, as a condition of approval for all coastal development permit involving grading, the LCP requires that an archeologist/paleontologist and Native American monitor observe grading activities and suspend all development activity if resources are discovered.
WATER QUALITY PROTECTION	Sections 30230 and 30231 of the Coastal Act require that marine resources and water quality be protected and if feasible, enhanced. To achieve these goals, the water quality policies have been modified to more fully address potential water quality related impacts associated with proposed residential development of the mesa. To achieve these goals, staff also recommends that the proposed storm drain system be prohibited from draining directly into the outer Bolsa Bay, the Bolsa Chica Ecological Reserve, Warner Pond or the lowland wetlands restoration area. Discharge of stormwater into other wetlands or ESHAs shall only be allowed if necessary to maintain or enhance the functional capacity of the receiving wetland or ESHA. Finally, suggested modifications have been prepared to reflect that nuisance summer flows will be directed into the local sewer system, consistent with the intent of the landowner/master developer.

ADDITIONAL INFORMATION

For further information, please contact **Stephen Rynas** at the South Coast District Office of the Coastal Commission at: **562-590-5071**. Copies of the proposed amended Land Use Plan and Implementation Program are available for review at the Long Beach Office of the Coastal Commission or at the Orange County Planning and Development Services

Department. The Orange County Planning and Development Services Department is located at 300 North Flower Street, Santa Ana, CA 92702-4048. **Ron Tippets** is the contact person for the Orange County Planning and Development Services Department, and he may be reached by calling **714-834-5394**.

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LIST OF EXHIBITS

(Attached to the end of the Staff Report)

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1. Trial Court Statement of Decision (June 4, 1997)
2. Appeal Court Statement of Decision (April 16, 1999)
3. RKJK Letter of September 9, 1997
4. Patricia Martz letter of October 8, 1999
5. Allan Schoenherr letter of October 20, 1999
6. Bolsa Chica Land Trust letter of November 18, 1999
7. Robert Hamilton Letter of November 22, 1999
8. LSA Associates letter of November 23, 1999
9. Bolsa Chica Land Trust letter of November 25, 1999
10. County of Orange Letter of November 29, 1999
11. Paone Callahan McHolm and Winton letter of December 1, 1999
12. California Coastal Commission Memo of December 17, 1999
13. City of Huntington Beach letter of January 11, 2000
14. Amigos de Bolsa Chica Letter of January 14,2000
15. C. Scott Findlay Letter stamped with February 8, 2000
16. Peter Bloom Letter of March 23, 2000
17. Peter Winchell Letter of March 23, 2000
18. City of Seal Beach Letter of June 8, 2000
19. Tierra Madre Consultants, Inc., Raptor Study of December 5, 1999
20. Kornarens and Howard Letter of August 4, 2000
21. Peter Bloom Letter of October 22, 2000
22. Ronald Jurek Letter of October 16, 2000
23. Brian James Walton Letter of October 23, 2000
24. Planned Community Program Implementing Actions[2]

[2] The Implementing Actions Program, as submitted in June 1995, consists of two parts, the Planned Community Program and the Wetland Restoration Program. The Wetland Restoration Program has not been included as an exhibit since the land has been acquired by the State of California. Due to this change in circumstance, the Wetland Restoration Program has been deleted from the Bolsa Chica LCP.

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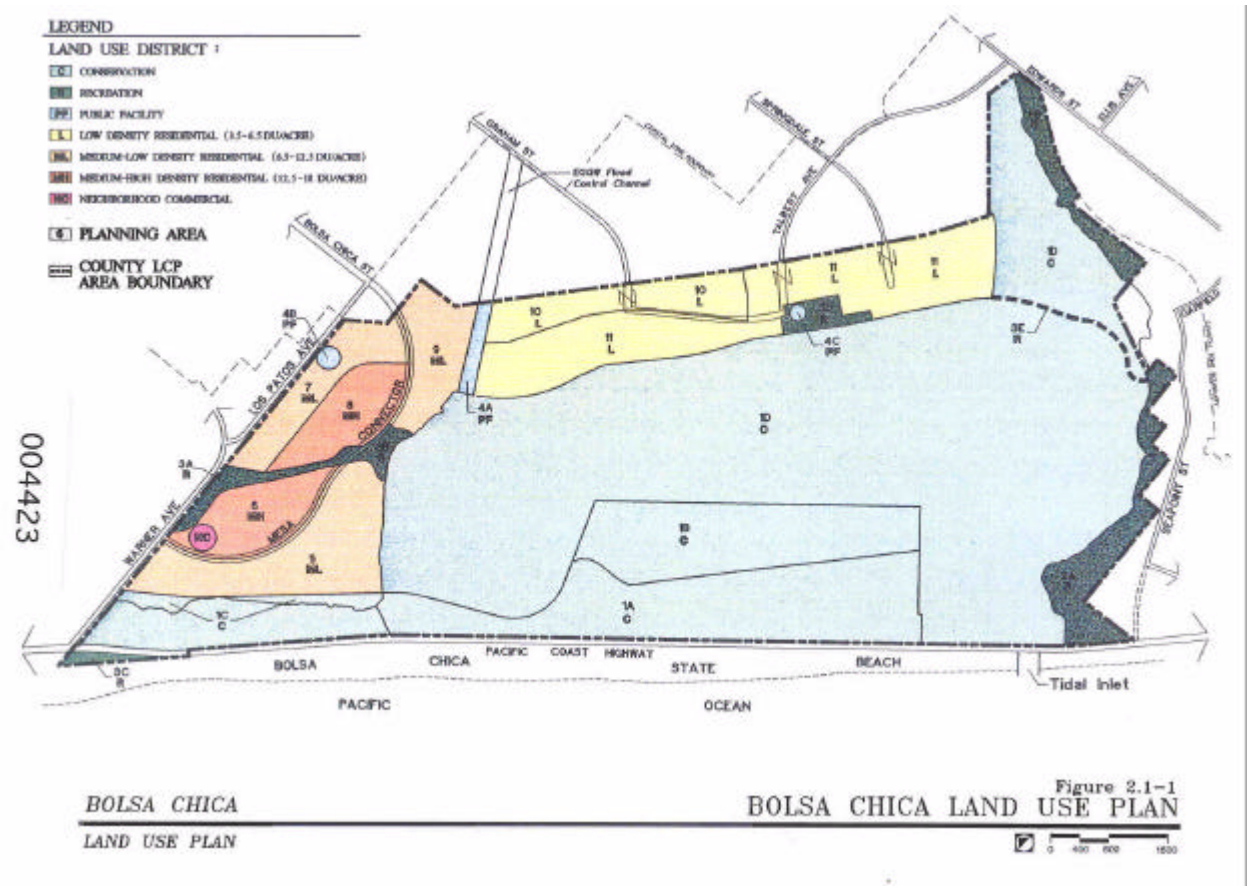
I. INTRODUCTION

A. SUMMARY OF THE BOLSA CHICA LCP AS SUBMITTED

The County of Orange, on June 5, 1995 submitted the Bolsa Chica Local Coastal Program to the Commission for certification (Figure 3 on page 16). The Local Coastal Program ("LCP") consists of an amended Land Use Plan ("LUP") and an Implementation Program. The amended Land Use Plan is a significant revision of the Commission certified 1986 Land Use Plan for Bolsa Chica and replaces the former plan in its entirety. The Implementation Program is the first implementation plan for Bolsa Chica to be submitted to the Commission. The Implementation Program, as submitted, consists of a variety of documents, including a Planned Community Program, a Wetlands Restoration Program, a Development Agreement, and Section 7-9 of the Orange County Zoning Code.

Figure 3: Bolsa Chica Land Use Plan as Submitted



The Bolsa Chica LCP Area (**Figure 9** on page 38) is comprised of an upland mesa top area referred to as the Bolsa Chica Mesa (hereafter referenced as the "Mesa"), and a

wetland ecosystem area referred to as the lowland. There is also a much narrower mesa along the southeastern portion of the Local Coastal Program Area referred to as the Huntington Mesa. The Huntington Mesa is proposed as a regional park.

The Department of Fish and Game determined in 1981 that the 1,324 acre lowland study area is a degraded wetland system that is comprised of functioning wetlands, functioning but degraded wetlands, and former wetlands[3]. Currently, approximately 934 acres of the lowlands are considered wetlands[4]. Interspersed among the wetlands are approximately 313 acres upland and former wetland areas that are environmentally sensitive habitat area because of their location and their function as wildlife habitat. Both the Mesa and lowland are vacant except for oil drilling activities that occur in the lowland.

The 1986 LUP for Bolsa Chica allowed for development of a marina with ancillary visitor serving commercial and residential development in a portion of the lowland on condition that the developer restore the remainder of the lowland. Restoration and ocean access to the marina was to be achieved through construction of an ocean entrance. The Bolsa Chica LUP, as submitted in June 1995 has substantially revised the 1986 LUP by eliminating, among other things, the plans for a marina at Bolsa Chica. The amended LUP, as submitted, provided for the construction of 3,300 homes at Bolsa Chica -- 2,400 on the Mesa and 900 in the lowland. The lowland residential development as originally proposed would have occurred on 185 acres. This development would have involved the fill of approximately 120 acres of wetlands and elimination of approximately 65 acres of the environmentally sensitive habitat area that are interspersed among the wetlands. The LCP provided at the time of submission that a permit for lowland development would only be issued upon condition that the developer restore part of the lowlands by dedicating approximately 770 acres of the lowland to a public agency, and by funding the restoration program. The developer would not have been required to dedicate the 770 acres of lowland or provide funding for restoration if they decided not to pursue development in the lowlands, or if conditions of the Army Corps of Engineers section 404 permit or the coastal development permit contain conditions not identified in the Local Coastal Program that raised the cost of restoration by one (1) percent or greater. As submitted, the LCP contained a restoration program for the lowlands that included a 250 foot wide non-navigable ocean entrance. A more detailed project description begins on page 48.

B. CHANGES IN CIRCUMSTANCES SINCE THE ORIGINAL SUBMITTAL OF THE LCP

Since the original submission in June 1995 the LCP has changed in response to changes in land ownership, Commission actions, and court decisions. Consequently certain

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[3] Department of Fish and Game Determination of the Status of the Bolsa Chica Wetlands, December 11, 1981.

[4] Table 3.5-8 (Habitat Types and Acreages), Draft EIR/EIS for the Bolsa Chica Lowlands Restoration Project, July 2000. The study area for Bolsa Chica EIR/EIS is 1,247 acres. The 1981 Department of Fish and Game study area was 1,324 acres.

components of the LCP, as submitted, are no longer applicable. The effects of these changes on the LCP are reviewed below.

In terms of ownership changes, the State of California acquired 880 acres of the lowland area from the developer on February 14, 1997 (Figure 6, on page 22). Thus, this 880 acre area will no longer be governed by the proposed County LCP. Through this acquisition, the State now owns the majority of the lowland. Accordingly, the developer sponsored wetland restoration program and the Bolsa Chica Development Agreement, as submitted with the Bolsa Chica LCP, are being deleted from the LCP that is now before the Commission.

Though the State of California acquired the majority of the lowland, the State did not buy the former Fieldstone parcel (Planning Area 10, as submitted). This area was deferred certification at the Commission's October 9, 1997 hearing since Fieldstone would not be able to transfer their development rights to another site within the Bolsa Chica Local Coastal Program area. The property was acquired by Hearthside Homes on September 30, 1997, the principal landowner for the Bolsa Chica Mesa. To address the issue of potential development rights within a land use designation of "*Conservation*", suggested modifications have been incorporated into Section 10.2.3 (Page 205) of the Planned Community Program to address this concern. The former Fieldstone parcel is anticipated to be purchased[5] by the State of California and to be incorporated into the wetland restoration program.

In terms of Commission actions and court decisions, the Commission made significant changes to the Bolsa Chica LCP in response to the Court remanding the LCP back to the Commission. These changes include elimination of the 900 residential units that were proposed in the lowlands, reduction of the density on the Bolsa Chica Mesa from 2,400 units to not more than 1,235 units, preservation of Warner Pond, elimination of the developer sponsored wetland restoration program, and deferral of the Fieldstone property from the certified LCP. The changes identified above to the Bolsa Chica Local Coastal Program, as submitted, were incorporated through suggested modifications at the Commission's October 9, 1997 meeting.

The Commission's October 9, 1997 decision was appealed. On April 16, 1999 the Appellate Court upheld the trial courts findings, added a new finding and remanded the Bolsa Chica LCP back to the Commission. The new finding of the Appellate Court was that the relocation of the Eucalyptus grove from the Bolsa Chica Mesa to the Huntington Mesa was not allowed under Section 30240 of the Coastal Act. To comply with the Appellate Court's remand, the Commission is once again re-hearing the Bolsa Chica LCP. Since the lowland area has been acquired by the state of California, for purposes of future restoration, the Commission's focus will be the development potential of the Mesa.

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[5] Draft EIR/EIS for the Bolsa Chica Lowlands Restoration Project, Volume 1, July 2000.

The County of Orange and the developer have also suggested changes to the proposed Land Use Plan in response to prior Commission actions, public comments, changes in land ownership, and the Court decisions. In November 2000 the County and the developer made an informal submittal of a revised plan. This current proposal is shown on Figure 4 (Page 19). A statistical table illustrating the various land use acreages is shown in Figure 5 (Page 21). Major highlights of the current proposal are summarized below:

- Creation of an approximately 1,249 acre wetland ecosystem as the sole land use of the Bolsa Chica Lowland.

- Conveyance of approximately 49 acres of privately owned land on the Huntington Mesa to the County of Orange for Harriet Wieder Regional Park.

- Conveyance of approximately 2 acres of privately owned land on the Bolsa Chica Mesa to the County of Orange for the conservation and protection of the Warner Avenue Pond Environmentally Sensitive Habitat Area.

- Creation of a 61 acre Community Park that incorporates not only Warner Avenue Pond ESHA and its open space buffer, but protects the 14 acre Eucalyptus Grove ESHA and its buffer area.

- Construction of a maximum of 1,235 homes, together with public parks, trails, and community facilities, on the Bolsa Chica Mesa in locations that are significantly set back from the State's wetland ecosystem area.

Additionally, since the Bolsa Chica Local Coastal Program was submitted to the Commission, the County of Orange undertook a major organizational change on July 1, 1997. As a consequence of this reorganization many department names and titles were changed. This report incorporates the administrative changes made as a result of the County's reorganization.

Figure 4: County Proposed Land Use Plan November 2000

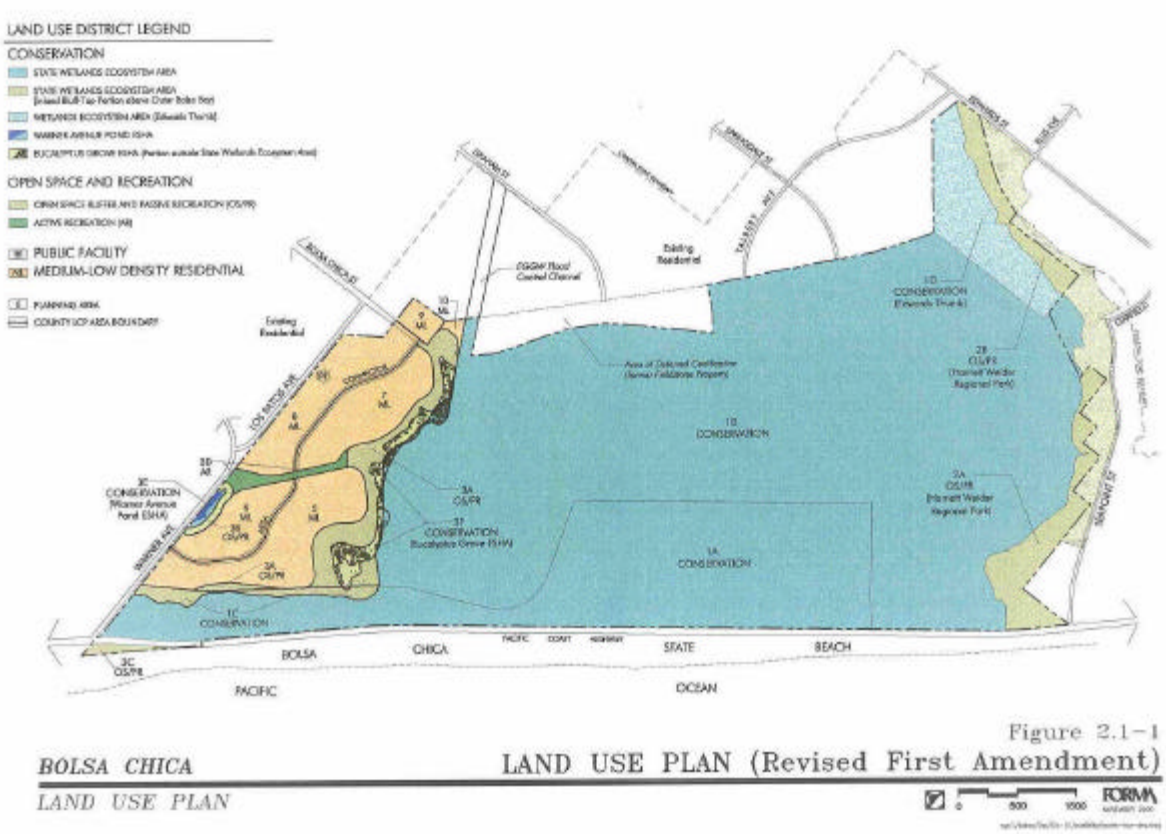

LAND USE DISTRICT LEGEND
CONSERVATION
OPEN SPACE AND RECREATION
PUBLIC FACILITY
MEDIUM-LOW DENSITY RESIDENTIAL
BOLSA
CHICA
STATE
BEACH
PACIFIC
OCEAN
BOLSA CHICA
LAND USE PLAN
Figure 2.1-1
LAND USE PLAN (Revised First Amendment)

Figure 5: County Proposed Land Use Summary November 2000

Bolsa Chica Land Use Plan

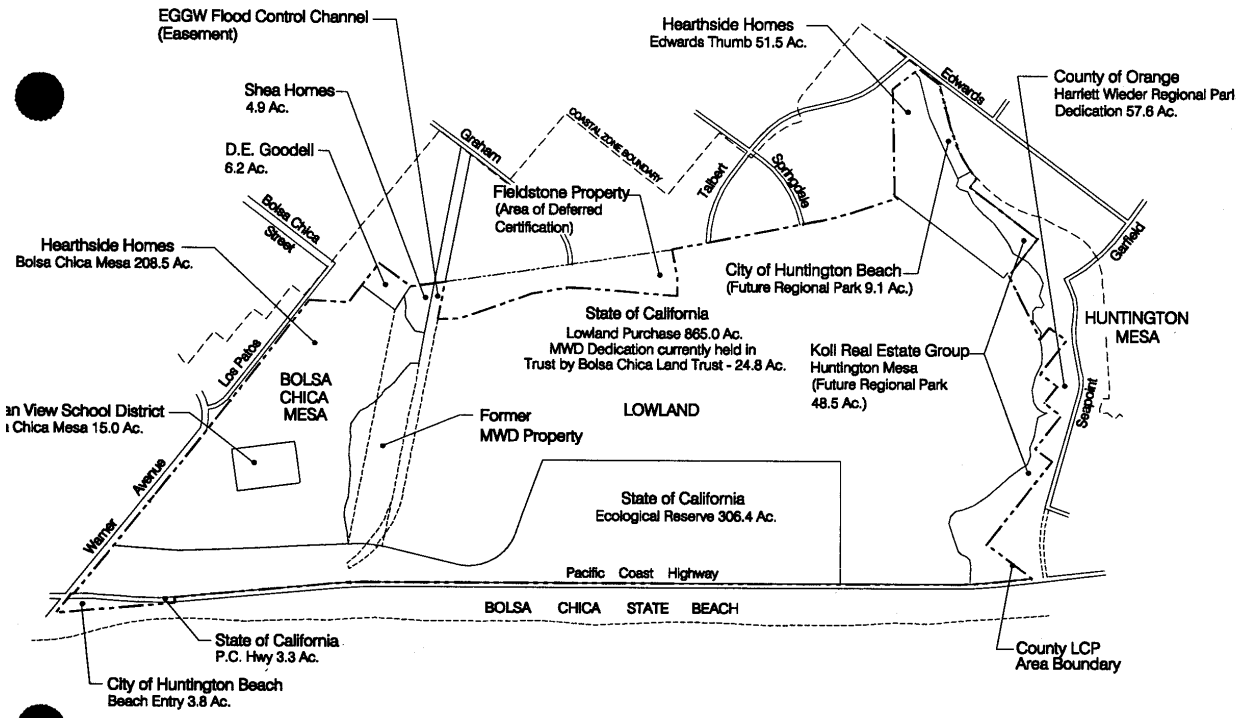
LAND USE CATEGORY		PLANNING AREA	GROSS ACRES
CONSERVATION:			
CONS	Existing State Ecological Reserve	1A, 1C	307
CONS	Future State Wetlands Restoration Area	1B	891
CONS	Wetlands Ecosystem Area (Edwards Thumb)	1D	51
CONS	Warner Avenue Pond ESHA (Bolsa Chica Mesa)	3E	2
CONS	Eucalyptus Grove ESHA (Bolsa Chica Mesa)	3F	14
	Total Conservation	--	**1,265 Acres**
OPEN SPACE AND RECREATION:			
OS/PR	Harriett Wieder Regional Park	2A, 2B	57
OS/PR	Mesa Community Park (not counting ESHAs)	3A, 3B	38
OS/PR	City's Bolsa Chica Beach Entry	3C	4
OS/AR	Mesa Community Park	3D	7
	Total Open Space and Recreation	--	**106 Acres**
PUBLIC FACILITY:			
PF	Water Storage Reservoir	4B	0
	Total Public Facilities	--	**0 Acres[c]**
RESIDENTIAL			
BOLSA CHICA MESA:			
ML	Medium Low (6.5 - 12.5 DU/Ac.)[1]	5, 6, 7, 8, 9, 10	
	Total Residential[1]	--	**173 Acres[c]**
PACIFIC COAST HIGHWAY		--	**3 Acres**
GRAND TOTAL		**ALL**	**1,547 Acres**

(6) Categories of residential density are based upon gross acres, including roads, common recreation facilities, slopes, and landscape areas. Public schools are a permitted use within Residential Planning Areas.

(7) The maximum total number of dwelling units for the Bolsa Chica LCP Land Use Plan shall be 1,235.

(7) The circular symbol for the Water Storage Reservoir conceptually identifies and locates this public facility as an overlay within the underlying Medium-Low Density Residential Planning Area.

Figure 6: Property Ownership November 2000



ACREAGE BY OWNERSHIP	County LCP Area
Hearthside Homes/Signal Landmark:	
- Bolsa Chica Mesa	208.5
- Edwards Thumb	51.5
- Huntington Mesa	48.5
Subtotal:	308.5
State of California:	
- Ecological Reserve	306.4
- Lowland Purchase	865.0
- MWD Dedication	24.8
- Pacific Coast Highway	3.3
Subtotal:	1203.4 *
City of Huntington Beach:	
- Pacific Coast Highway and Warner Avenue	3.8
- Huntington Mesa	9.1
Subtotal:	12.9
Ocean View School District	15.0
D.E. Goodell	6.2
Shea Homes	4.9
TOTAL:	1547.0

* Orange County Flood Control District holds 22.7-acre easement over Lowland.

Figure 1.2-4

BOLSA CHICA PROPERTY OWNERSHIP

LAND USE PLAN

0 600 1200 2400 FORMA

C. NUMBERING OF LAND USE POLICIES AND IMPLEMENTING REGULATIONS

The suggested modifications of this staff report use the County's June 1995 submittal that is dated December 14, 1994 as the base document. Intermediary changes consisting of the Commissions actions of January 11, 1996 and October 9, 1997 are not shown. **This report includes all of the County's Land Use Policies starting on page** Error! Bookmark not defined.

With respect to the land use plan portion of this report, in prior reports the Commission utilized a sequential numbering system to identify the various suggested modifications to the land use plan policies. With this report, the numbering of the land use policies will be based on the County's Land Use Plan (First Amendment) dated December 14, 1994. Land Use Plan policies are "*built*" by taking the Section Number in which the policy is located and adding the policy number. For example Section 3.1.2 (Page 58) is titled "*Wetland/Biological Resource Policies*". The first policy in this section is "*Zoning Policy*". Consequently the number of this policy is 3.1.2.1. Policies (as submitted) are shown in parenthesis at the end of each suggested modification. New policies are identified by the word "*NEW*" in parenthesis at the end of each applicable policy.

The reason for the change in identifying the land use policies is that this report incorporates all the land use plan policies (even those land use policies not changed through suggested modifications). When the County republishes the Bolsa Chica LCP some of land use plan policy numbers will change to reflect the deletion and addition of land use plan policies proposed through the suggested modifications.

With respect to the implementation program of this report, the numbering system for the regulations are again based on the December 14, 1994 version of the County's Planned Community Program. As with the land use plan amendment, when the County republishes the Planned Community Program some of the regulation numbers will change as a consequence of the Commission's insertion and/or deletion of regulations through suggested modifications.

D. TRIAL COURT REMAND OF THE BOLSA CHICA LCP (JUNE 4, 1997)

The Commission's decision on January 11, 1996, to approve with suggested modifications the County of Orange Bolsa Chica Land Use Plan Amendment No. 1-95/Implementing Actions Program was legally challenged. There were two critical deficiencies in the Court's view. The Court found that the evidence in the record did not support the Commission's conclusion that the proposed residential land use designation in the lowland was a permissible use pursuant to Sections 30233 and 30411 of the

Coastal Act. It also found that Warner Pond, an approximately 1.7 acre wetland on the Bolsa Chica Mesa, was an environmentally sensitive habitat area (ESHA) and that the Commission failed to explain how such ESHA could be filled consistent with Section 30240 of the Coastal Act. The Court consequently remanded the Bolsa Chica LCP back to the Commission in order for these two issues to be reevaluated. Upon advice of the Deputy Attorney General, the Commission limited the public hearing to the residential designation in the lowland and the fill of Warner Pond. The Trial Court's decision is attached as Exhibit 1.

E. APPELATE COURT REMAND OF THE BOLSA CHICA LCP (APRIL 16, 1999)

The Commission at its October 9, 1997 meeting, approved the Bolsa Chica LCP with suggested modifications in response to the trial court's decision. At this meeting, the Commission eliminated approval of the residential development in the lowlands and the filling of Warner Pond. However, the Commission again approved the relocation of the Eucalyptus Grove ESHA from the Bolsa Chica Mesa to the Huntington Mesa. This ESHA relocation was first approved by the Commission when it acted on the Bolsa Chica LCP on October 23, 1985. The Commission's October 9, 1997 decision on remand was again challenged and the trial court held the Commission erred in limiting the public hearing to the residential development designation in the lowland and the fill of Warner Pond. The trial court's decisions were appealed.

On April 16, 1999, the appellate court issued a published decision upholding the trial court's decision to grant the petition for writ of mandate. The appellate court agreed with the trial court that the filling of the lowlands for residential uses was not an allowable use under Section 30233 of the Coastal Act. The appellate court also agreed with the trial court that Commission's findings failed to adequately explain the filling of Warner Pond, although the appellate court's rationale was different from the trial court's reasoning. The appellate court agreed with the Commission that in limited circumstances, the filling of Warner Pond to widen Warner Avenue could be an allowable use under Section 30233(a)(5) (incidental public services); however, the court held that roadway expansions are permitted under that provision only when no other alternative exists and the expansion is necessary to maintain existing traffic capacity. Since the Commission had found the expansion was necessary to accommodate future traffic created by local and regional development in the area, the LCP was defective insofar as it approved the filling of Warner Pond. Finally, the appellate court found that the trial court erred in allowing the relocation of the Eucalyptus Grove ESHA. The appellate court held that the Coastal Act did not permit the destruction of an ESHA simply because the destruction was to be mitigated offsite. The appellate court found there must be some showing that the destruction of the ESHA is needed to serve some other interest recognized by the Coastal Act. Absent a Coastal Act policy or interest directly conflicting with the application of Section 30240 to the ESHA, the ESHA must be protected.

In sum, the appellate court held the Commission's prior approval of the Bolsa Chica LCP was inconsistent with the Coastal Act in three ways:

- Residential development is not an allowable use in wetlands;
- Expansion of a roadway into a wetland can only be permitted if necessary to maintain existing traffic capacity and where there are no feasible alternatives; and

- ESHA must be protected regardless of its quality unless destruction of the ESHA is necessary to serve a Coastal Act policy which directly conflicts with Section 30240 of the Coastal Act.

This matter has been remanded to the Commission for further proceedings consistent with the appellate court's decision. The Appellate Court's decision is attached as Exhibit 2.

F. AREAS OF CONTROVERSY

Staff believes that the staff recommendation with suggested modifications results in the Bolsa Chica Local Coastal Program conforming to the provisions of the Coastal Act, and the direction provided by the courts. Nevertheless, based on discussions with the County of Orange, the major landowner, public interest groups, and concerned citizens, staff is aware that controversy remains over a number of issues. Staff anticipates that the following topics will be raised at the Commission meeting. A summary of the staff recommendation begins on page 6.

RESIDENTIAL DEVELOPMENT: To preserve Warner Pond, the Commission imposed a residential cap of 1,235 residential units at its October 9, 1997. Under the 1997 decision residential development would occur on both the upper and lower benches of the Mesa. Commission staff is recommending that this residential cap of 1,235 residential units be maintained. However, staff now recommends that residential development be limited to the upper bench of the Bolsa Chica Mesa. Commission staff is recommending that residential development be concentrated on the upper bench of the mesa in close proximity to existing developed areas and that all of the resources on the lower bench be conserved in a manner that is more protective overall of significant coastal resources than protecting each specific habitat area in conjunction with development of the entire mesa. Though the lower bench is a non-native grassland, it provides significant foraging area for the raptors that reside in the Eucalyptus ESHA. Furthermore, the lower bench is ecologically important as a wildlife corridor connecting Warner Pond to the remaining ecosystem and contains one of the few remaining significant populations of the southern tarplant.

WETLAND PROTECTION: The Bolsa Chica Mesa contains several small wetlands. One wetland was recently discovered and four wetlands have been deleted as a result of a recent wetland delineation study. Commission staff concurs that the recently discovered wetland is a seasonal wetland. Hearthside Homes, the project proponent contends that this wetland is an artificial wetland of anthropogenic activity (Exhibit 11). Others contend that this wetland area is a "*vernal*" pool and should be protected. Commission staff recommends that the Commission concentrate development on the upper bench of the Bolsa Chica Mesa to protect the lower bench as a natural area. The concentration of development on the upper bench will necessitate impacts to resources on the upper bench. Although this concentration of development will necessitate the fill of the seasonal wetlands by Los Patos concentrating development on the upper bench and conserving the resources on the lower bench resolves the conflict between development and resource protection in a manner that is more protective overall of significant coastal resources located on the Mesa than protecting each specific habitat area in conjunction with development of the entire mesa. Furthermore, this seasonal wetland has little habitat value.

When the Commission acted on the Bolsa Chica LCP in January 1996 the Commission found that five pocket wetlands existed on the Mesa. The Commission allowed the proposed residential development to fill these wetlands with off-site mitigation at the ratio of 4:1 based on the fact that these wetlands would be too close to the proposed urban development. The project proponent, Hearthside Homes recently submitted a new wetland delineation by Glenn Lukos Associates[8] which was received by Commission staff in October 1999. This study concluded that three of the wetland areas no longer qualify as wetlands. Commission staff concurs with this assessment (Exhibit 12). Consequently, development will be allowed to occur on the former wetland sites. Though Commission staff concurs with this assessment by Glenn Lukos Associates others may argue the point.

Commission staff is also recommending that no storm water outfalls be allowed to discharge directly into Outer Bolsa Bay, the Bolsa Chica Ecological Reserve, Warner Pond or the lowlands restoration area. Allowing freshwater to rapidly discharge into these waters, even if it is unpolluted, would have an adverse impact on the ecology of Outer Bolsa Bay, which is a marine environment. Fresh water will act as a toxin to plant and animal life dependent on sea water. This staff recommendation will preserve Outer Bolsa Bay as a marine ecosystem.

ESHA PROTECTION: ESHA areas function in cooperation with non-ESHA areas as an ecosystem. Further, as discussed above, the Coastal Act also requires that new development be located contiguous with or in close proximity to existing developed areas. The mesa contains significant ESHA areas such as the Eucalyptus grove, coastal

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[8] "Delineation of pocket wetlands on the Bolsa Chica Mesa at Huntington Beach, Orange County California". Glenn Lukos Associates, September 30, 1999.

sage scrub community, wetlands, and the Southern Tarplant. These ESHAs are concentrated on the lower bench of the mesa. Staff recommends that the majority of the lower bench of the Bolsa Chica Mesa be designated as Conservation so that the ESHA and non-ESHA areas function as a cohesive ecosystem and that residential development be concentrated on the upper bench so that new development is sited in close proximity to existing development. The fifteen acre Ocean View school site will be relocated next to Warner Avenue (Figure 1 on page: 5). Hearthside Homes disagrees with this recommendation and maintains that a 100 foot buffer from ESHA areas would be adequate for maintaining the viability of ESHA areas.

The areal extent of the Eucalyptus grove has been disputed. Eucalyptus trees are non-native trees and are not normally considered as ESHA qualifying vegetation. The Eucalyptus grove was found by the Commission to qualify as an ESHA based on reports prepared by the Department on Fish and Game (June 1982[9] and April 1985[10]). In the June 1982 report the Department of Fish and Game determined that the eucalyptus grove (20.5 acres in 1982) qualified as an ESHA based on its value as a raptor roosting area. This conclusion that the eucalyptus grove qualified as an ESHA was reiterated in 1985.

The findings of the Department of Fish and Game concerning the extent of the eucalyptus grove was based on data obtained in 1982 or earlier. As plants grow and die over time, the areal extent occupied by plants can change. At the time the County of Orange submitted the Bolsa Chica LCP (June 1995) the County incorporated a habitat map by Williamson & Schmid (Figure 3.1-1 in the submitted LUP). The graphic data of the Williamson & Schmid map was incorporated into Table 2-1 of the Wetlands Restoration Program which identified the eucalyptus grove as occupying 6.5 acres. The County, however, submitted updated information which identified that the Eucalyptus grove now occupies approximately 13 acres.

Though the Williamson & Schmid map identifies areas where the Eucalyptus trees are the predominate vegetative type, isolated trees and small clumps exist throughout the area. These smaller Eucalyptus clumps were not shown on the Williamson & Schmid map. To document that the eucalyptus grove is actually larger, the Bolsa Chica Land Trust has submitted a "*Raptor Habitat Assessment of the Bolsa Chica Mesa*" (dated December 5, 1999) by Tierra Madre Consultants. Tierra Madre Consultants concluded that the eucalyptus grove ESHA currently extends beyond the 1982 Fish and Game delineation of 20.5 acres to approximately 24 acres. According to the Tierra Madre report the Department of Fish and Game's delineation *"… included only a portion of the existing Eucalyptus grove; it did not include areas to the north and east along the bluff, at the toe of the slope, and along the Bolsa Chica Street extension. These areas may*

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9 Environmentally Sensitive Areas at Bolsa Chica, Department of Fish and Game, June 3, 1982.

10 Department of Fish and Game Findings and Recommendations for the Maintenance, Restoration, and Enhancement of Wetlands and Non-wetland Environmentally Sensitive Habitat Area at Bolsa Chica, Orange County, Department of Fish and Game, April 8, 1985.

be particularly important to nesting White-tailed Kites and red-shouldered Hawks." The areal extent of the eucalyptus grove is consequently influenced by the methodology of the parties conducting the studies.

Though the areal extent of the eucalyptus grove is subject to differences of professional opinion, Commission staff has recommended that residential development be concentrated on the upper bench of the Bolsa Chica Mesa. Staff believes that concentrating development on the upper bench of the mesa, in close proximity to existing developed areas and conserving all of the resources on the lower bench of the mesa, is more protective, overall, of significant coastal resources than protecting each specific habitat area in conjunction with development of the entire mesa. The effect of this recommendation is that eucalyptus trees which are inland of the proposed buffer will be eliminated, irrespective of whether or not they should be included as part of the ESHA. As previously noted, the Williamson & Schmid map did not identify eucalyptus trees as the predominate form of vegetation. According to the Williamson & Schmid map much of the area around the Bolsa Street extension has been designated as ruderal. Further, Tierra Madre Consultants report also notes that "*For raptors, the structure of the habitat is more important than plant species composition*".

The staff recommendation to concentrate residential development on the upper bench of the Bolsa Chica Mesa will also affect a small population of Southern Tarplant. The Southern Tarplant is considered a Federal "*Species of Concern*" and a California Native Plan Society "*1B*" species that is a rare, threatened, or endangered plant either in California or elsewhere (Figure 1on Page 260The concentration of development on the upper bench of the mesa will necessitate impacts to tarplant resources on the upper bench. Although this concentration of development on the upper bench of the mesa will result in the loss of Tarplants staff believes that concentrating development on the upper bench of the mesa, in close proximity to existing developed areas and conserving all of the resources on the lower bench of the mesa, is more protective, overall, of significant coastal resources than protecting each specific habitat area in conjunction with development of the entire mesa.

MESA COMMUNITY PARK: The Mesa Community Park is a proposed 49 acre park that incorporates Warner Pond and its surrounding open space buffer, and provides additional buffer area for the Eucalyptus grove. As proposed by the County of Orange this park would allow both active and passive forms of recreation. As an active park playgrounds and playfields would be allowed. Construction of these facilities would require that the area be graded to provide a level area for these activities.

As discussed above, Commission staff is recommending that residential development be concentrated on the upper bench of the Bolsa Chica Mesa. The lower bench will be designated as Conservation to protect the lower bench as a natural ecosystem. To preserve the natural landform, grading to construct park improvements would not be allowed. The effect of designating the lower bench as Conservation is that Mesa

Community Park can not be developed as an active park. The area to be occupied by the park needs to be preserved as open space for two reasons. First, this type of topographic feature formed by the hillside connecting the lower and upper benches is often used by wildlife as a movement corridor. Second, many animals may be using this area for denning and nesting (Exhibit 12). To assure that the park can be used as habitat Commission staff is recommending that: only native vegetation will be allowed, landform alteration will not be allowed and that the corridor shall extend at least 50 feet beyond any hilltops (upper bench) onto the upper bench. Hearthside Homes is not in agreement with this staff recommendation.

LAND FORM ALTERATION: The Bolsa Chica LCP as submitted by the County of Orange contains policies and regulations that would allow grading in Conservation areas in support of development occurring outside of the Conservation area. To minimize land form alterations, Commission staff is recommending that in areas designated Conservation, activities resulting in land form alteration, such as grading, only be allowed for uses permitted within the Conservation designation.

ARCHAEOLOGY: The Bolsa Chica Mesa contains archeological resources. The best method for preserving and treating of these archeological resources has been the subject of extensive debate. Some members of the public argue that proposed development not be allowed in areas which contain archeological resources. The project proponent for residential development contends that these resources are adequately being mitigated through research and recovery.

To resolve this conundrum, Commission staff recommends that an archeological research design for Bolsa Chica be completed and submitted along with any coastal development permit application for land use development within any planning area that contains archaeological or paleontological resources. This will allow the proposed development and the archeological resources to be evaluated concurrently. Through this staff recommendation the best method of preserving and treating archeological resources is assured.

WATER QUALITY: The development authorized under this local coastal program would allow the construction of up to 1,235 residential units and associated infrastructure, such as roads, to serve this development. This development will result in land form alteration and new impervious surfaces which will result in significant changes to the drainage system, the rate of discharge, and the quality of water flowing off the Bolsa Chica Mesa into coastal waters.

To minimize impacts to water quality, Commission staff recommends that best management practices be used to treat the water, that summer nuisance flows be directed into the sanitary sewer system and that the storm water outfalls not discharge directly into Outer Bolsa Bay, the Ecological Reserve, Warner Pond or the lowland wetlands restoration area.

II. COMMISSION RESOLUTIONS FOR ADOPTING FOR DENIAL AS SUBMITTED AND APPROVAL OF THE BOLSA CHICA LOCAL COASTAL PROGRAM WITH SUGGESTED MODIFICATIONS

Following the public hearing, staff recommends that the Commission adopt the following resolutions for denying the Bolsa Chica LCP as submitted and approving it as modified. The appropriate motion to introduce the resolution and a staff recommendation is provided just prior to each resolution.

RESOLUTION #1 (Resolution to deny certification of the County of Orange's Bolsa Chica Land Use Plan Amendment 1-95 for the Bolsa Chica, as submitted)

Motion #1

*"I move that the Commission **CERTIFY** the County of Orange's Bolsa Chica Land Use Plan Amendment 1-95 for the Bolsa Chica, as submitted."*

Staff recommendation

Staff recommends a **NO** vote. Failure of this motion will result in denial of the land use plan amendment as submitted and adoption of the following resolution and findings. An affirmative vote by a majority of the appointed Commissioners is needed to pass the motion.

Resolution #1

*The Commission hereby **DENIES** certification of the County of Orange's Land Use Plan Amendment 1-95 for Bolsa Chica and adopts the findings stated below on the grounds that the amended Land Use Plan does not meet the requirements of and conform with the policies of Chapter 3 of the California Coastal Act. Certification of the Land Use Plan as amended would not meet the requirements of Section 21081 of the California Environmental Quality Act, because there would be significant adverse effects on the environment and there are feasible mitigation measures and/or feasible alternatives that would substantially lessen the significant adverse impacts on the environment that would result from certification of the land use plan amendment as submitted.*

RESOLUTION #2 (Resolution to approve certification of the County of Orange's Land Use Plan Amendment 1-95 Bolsa Chica, if modified)

Motion #2

*"I move that the Commission **CERTIFY** the County of Orange Land Use Plan Amendment 1-95 for the Bolsa Chica, if it is modified in conformance with the suggestions set forth in this staff report."*

Staff Recommendation

Staff recommends a **YES** vote. Passage of the motion will result in certification of the land use plan amendment with suggested modifications and the adoption of the following resolution and findings. An affirmative vote by a majority of the appointed Commissioners is needed to pass the motion.

Resolution #2

*The Commission hereby **CERTIFIES** the County of Orange's Land Use Plan Amendment 1-95 for Bolsa Chica, if modified as suggested and adopts the findings stated below on the grounds that the amendment, as modified, will meet the requirements of and conform with the policies of Chapter 3 of the Coastal Act. Certification of the Land Use Plan amendment, as modified, meets the requirements of the California Environmental Quality Act, because either 1) feasible mitigation measures and/or alternatives have been incorporated to substantially lessen any significant adverse effects of the plan on the environment, or 2) there are no further alternatives or mitigation measures that would substantially lessen any significant adverse effects the Land Use Plan Amendment may have on the environment.*

RESOLUTION #3 (Resolution to deny certification of the County of Orange's Implementation Program for the Bolsa Chica, as submitted)

Motion #3

*"I move that the Commission **REJECT** the County of Orange's Implementation Program for the Bolsa Chica, as submitted."*

Staff Recommendation

Staff recommends a **YES** vote. Passage of this motion will result in rejection of the Implementation Program and the adoption of the following resolution and findings. An affirmative vote by a majority of the Commissioners present is needed to pass the motion.

Resolution #3

*The Commission hereby **DENIES** certification of the County of Orange Implementation Program for Bolsa Chica and adopts the findings set forth below on the grounds that the amendment does not conform with, and is inadequate to carry out, the provisions of the certified Land Use Plan. Certification of the Implementation Program would not meet the requirements of the California Environmental Quality Act as there are feasible mitigation measures and/or feasible alternatives that would substantially lessen the significant adverse impacts on the environment that would result from certification of the Implementation Program as submitted.*

RESOLUTION #4 (Resolution to approve certification of the County of Orange's Implementation Program for Bolsa Chica, if modified)

Motion #4

*"I move the Commission **APPROVE** the County of Orange's Implementation Plan for Bolsa Chica, if it is modified in conformity with the suggested modifications set forth in this staff report."*

Staff Recommendation

Staff recommends a **YES** vote. Passage of this motion will result in certification of the Implementation Program with suggested modifications and the adoption of the following resolution and findings. An affirmative vote by a majority of the Commissioners present is needed to pass the motion.

Resolution #4

*The Commission hereby **CERTIFIES** the County of Orange's Implementation Program for Bolsa Chica, if modified, on the grounds that the Implementation Program conforms with, and is adequate to carry out, the provisions of the certified Land Use Plan as amended. Certification of the Implementation Program if modified as suggested complies with the California Environmental Quality Act, because either 1)feasible mitigation measures and/or alternatives have been incorporated to substantially lessen any significant adverse effects of the Implementation Program on the environment, or 2) there are not further feasible alternatives and mitigation measures that would substantially lessen any significant adverse impacts on the environment.*

III. PROCEDURAL PROCESS

STANDARD OF REVIEW: The standard of review for land use plan amendments, is found in Section 30512 of the Coastal Act. This section requires the Commission to certify an LUP amendment if it finds that it meets the requirements of Chapter 3 of the Coastal Act. Specifically, Section 30512 states: *"(c) The Commission shall certify a land use plan, or any amendments thereto, if it finds that a land use plan meets the requirements of, and is in conformity with, the policies of Chapter 3 (commencing with Section 30200). Except as provided in paragraph (1) of subdivision (a), a decision to certify shall require a majority vote of the appointed membership of the Commission."*

Pursuant to Section 30513 of the Coastal Act, the Commission may only reject zoning ordinances or other implementing actions, as well as their amendments, on the grounds that they do not conform with, or are inadequate to carry out, the provisions of the certified land use plan. The Commission must act by majority vote of the Commissioners present when making a decision on the implementing portion of a Local Coastal Program.

COMMISSION VOTING PROCESS: Pursuant to Section 13540 of the Commission's regulations certification of the local coastal program will be based on specific written findings (this report) adopted by majority vote of the members prevailing on the motion.

PROCEDURAL REQUIREMENTS: Pursuant to Section 13551(b) of the California Code of Regulations, a resolution for submittal must indicate whether the local coastal program will require formal local government adoption after Commission approval, or is an amendment that will take effect automatically upon the Commission's approval pursuant to Public Resources Code Sections 30512, 30513 and 30519. The County of Orange did not indicate in its submittal resolution that this local coastal program would take effect automatically upon Commission approval. Further, this certification is subject to suggested modifications by the Commission. Therefore, this local coastal program will not become effective until the County of Orange formally adopts the suggested modifications and complies with all the requirements of Section 13544 including the requirement that the Executive Director determine the County's adoption of the Amendment to the Land Use Plan and Implementation Program is legally adequate.

IV. BACKGROUND

A. AREA DESCRIPTION

Bolsa Chica comprises approximately 1,588 acres of unincorporated land within the coastal zone of northwestern Orange County (see Figure 7 on page 36 and Figure 8 on page 37). Currently, the land exists predominantly as open space containing both upland and wetland habitat. An extensive wetland area located between two upland mesas to the north and south dominates the site. The Pacific Coast Highway, Bolsa Chica State Beach, and the Pacific Ocean border the western side, while urban development occurs to the east. Bolsa Chica was formerly part of an extensive coastal lagoon/salt marsh system, which was estimated to cover 2,300 acres in 1894 by the U.S. Fish and Wildlife Service. Today, substantial portions of the wetland habitat remain in the lowland area. The two mesas consist primarily of non-native grasslands.

Bolsa Chica is a unique place along the California coast. Bolsa Chica has undergone substantial degradation caused by human interference with its natural wetlands processes commencing in the 1800's. Bolsa Chica has been used for a variety of purposes over the years, most notably for on going oil and gas production since the 1930's. Beginning in the 1960's and continuing through the late 1980's it became increasingly recognized that the wetlands at Bolsa Chica were in need of major restoration. Initially restoration was proposed to be achieved through construction of a new ocean inlet in conjunction with a marina (boating facility). Starting in the late 1980's the economic feasibility of a marina came into question, as well as questions related to potential adverse environmental impacts of a marina. The County of Orange determined in 1994 that an ocean inlet with no marina could also achieve restoration via a comprehensive development plan. In June 1995 the County of Orange submitted the local coastal program to achieve restoration through a comprehensive development plan. This LCP submission is the subject of this Commission hearing.

Over the past century, Bolsa Chica has been affected by urban, recreation, and oil related development. Three state oil leases occur within the lowlands, which currently support 331 oil wells (active and inactive), related oil facilities, and improved and unimproved roadways. Although development has markedly changed Bolsa Chica, the area currently contains substantial and important natural resource values. Bolsa Chica is one of the largest remaining coastal wetlands in southern California.

Figure 7: Location Maps

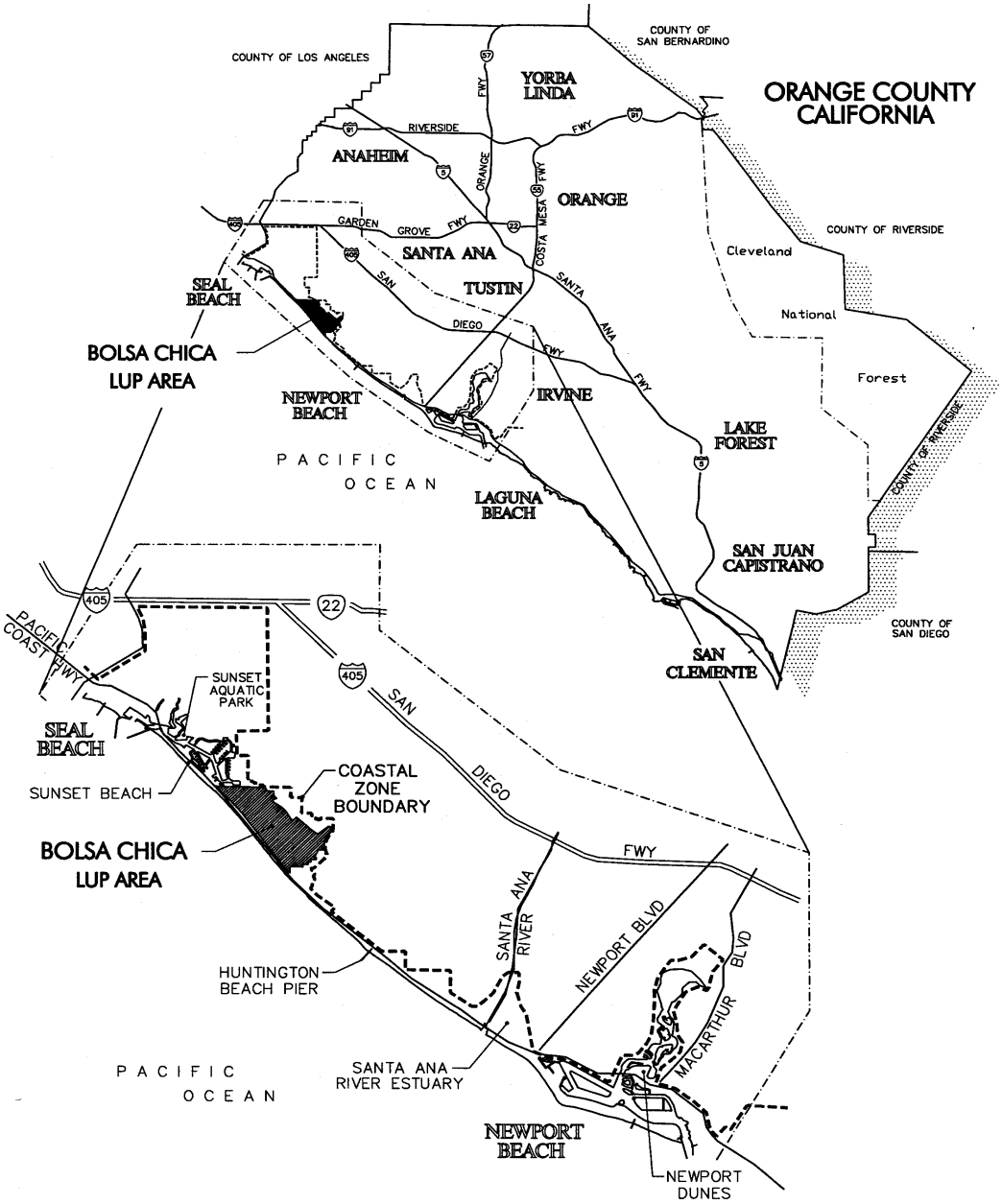


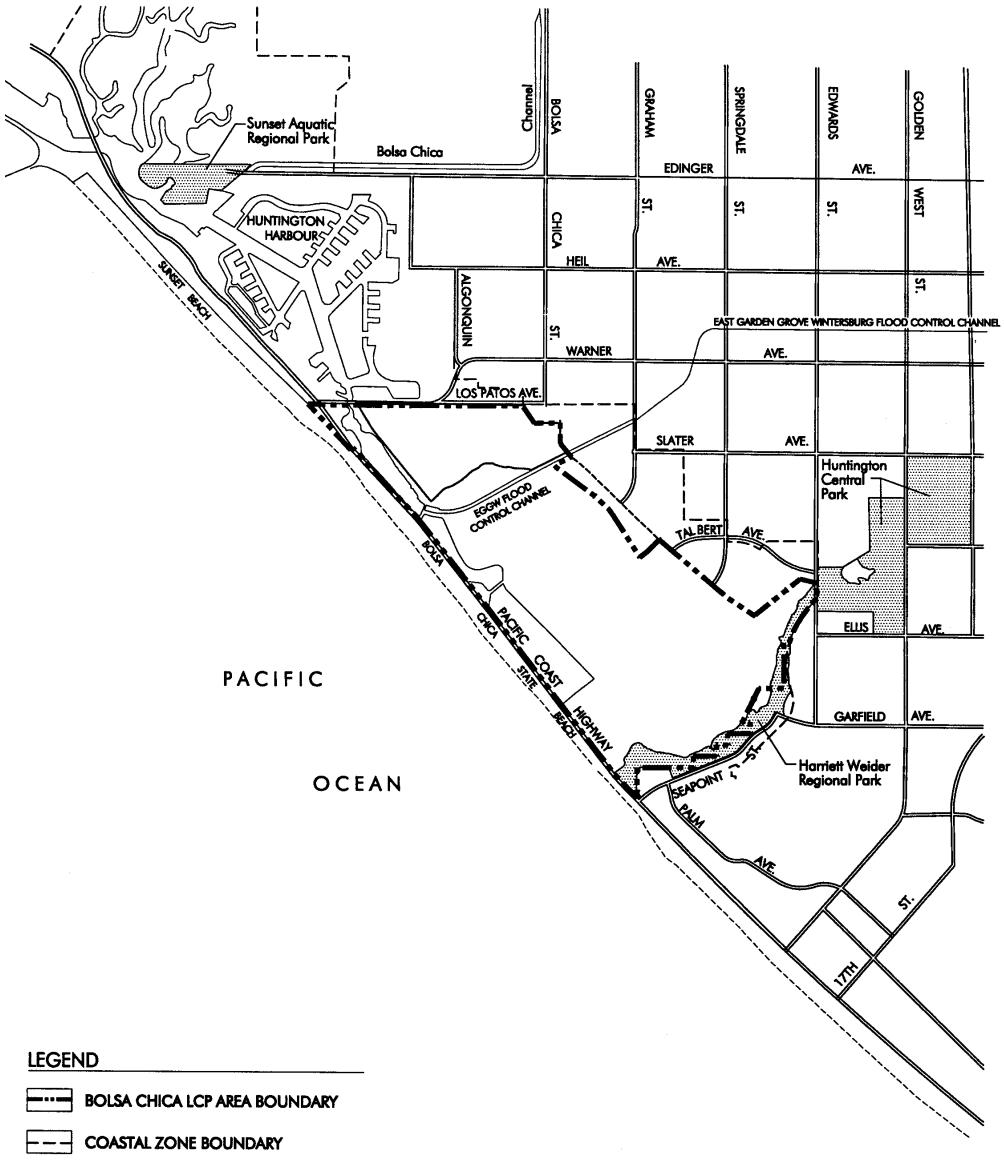
Figure 1.1–1

BOLSA CHICA LOCATION MAPS

LAND USE PLAN

NOT TO SCALE

Figure 8: Vicinity Map



BOLSA CHICA

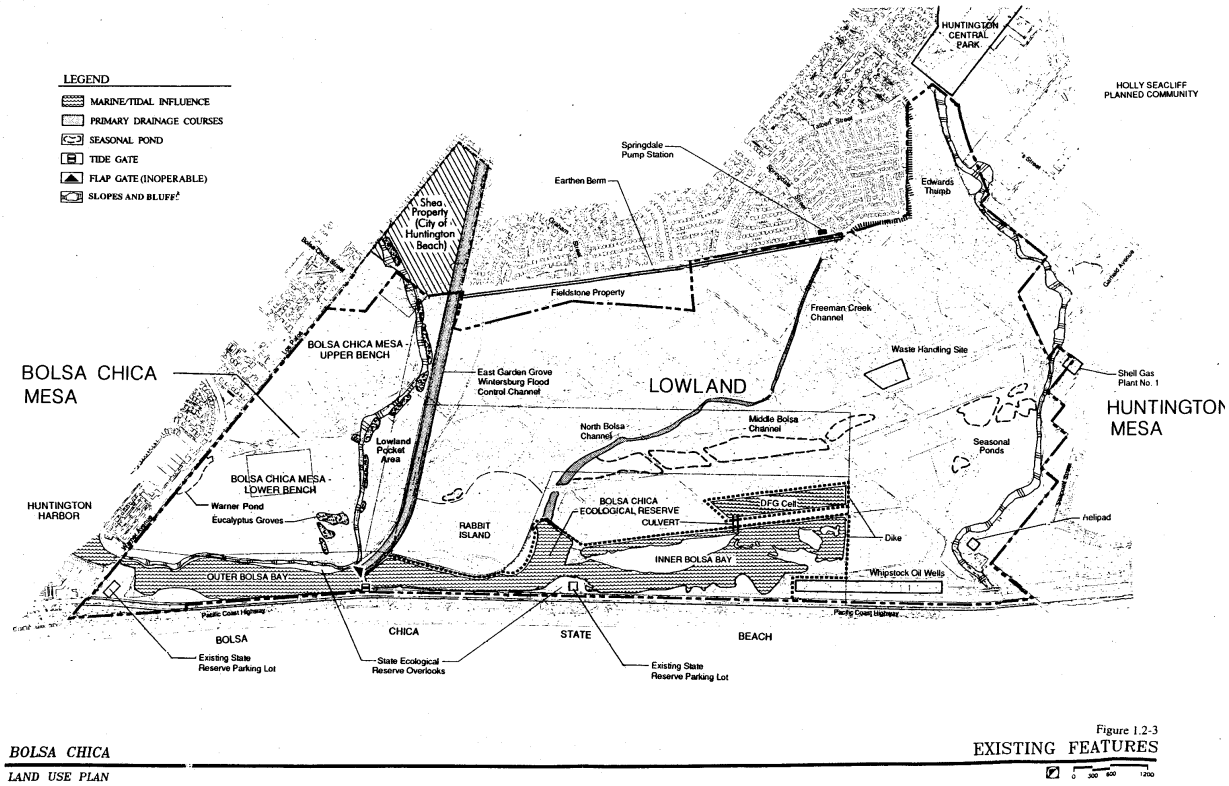
LAND USE PLAN

Figure 1.2–1
VICINITY MAP

0 1200

Based on topographic features, Bolsa Chica is divided into three subareas, the Bolsa Chica Mesa (Mesa), the Bolsa Chica lowlands (lowlands) and the Huntington Mesa. The lowland is approximately 1,247 acres (see Figure 9. The Mesa is approximately 227 acres. Huntington Mesa, the smallest subarea, is approximately 58 acres in size. Seven acres of the 1,588 acre Bolsa Chica LCP area occur outside the three subareas and consist of land occupied by Pacific Coast Highway, and a small parcel of land that is owned by the City of Huntington Beach on the seaward side of Pacific Coast Highway near the intersection of Pacific Coast Highway and Warner Avenue.

Figure 9: Existing Features



Today, the lowlands consist mostly of wetland habitat with approximately 900 acres of wetland. Interspersed throughout the wetlands are approximately 325 acres former wetlands that are utilized for oil production activities (roads and pads) and support upland habitat. Historically, the lowlands were part of a coastal tidal lagoon containing expansive salt marsh habitat with connection to the ocean through what is now Huntington Harbour. Prior to 1825, the Santa Ana River periodically flowed through the lowlands. During floods in 1825, the river changed course and the lowlands were left with a relict drainage pattern. The Santa Ana River now flows into the Pacific Ocean about six miles to the southeast at the border between the cities of Huntington Beach and Newport Beach. A majority of the lowland was acquired by the State of California on February 14, 1997.

The movement of tidal waters into the interior of the lowlands ended in 1899 when the Bolsa Chica Gun Club constructed a tidal dam and the historic tidal entrance filled with sand. All ocean water entering Bolsa Chica must now arrive through Anaheim Bay and Huntington Harbour. Currently, most of the lowlands do not receive regular tidal flushing with ocean water. Tidal flushing is currently limited to the State Ecological Reserve.

The western portion of the lowlands, adjacent to Pacific Coast Highway, contains Inner and Outer Bolsa Bay, which are part of a 306 acre ecological reserve managed by the Department of Fish and Game. The ecological reserve was created during 1977 and 1978. Adjacent to the Ecological Reserve is Rabbit Island, which is a sand dune area. Rabbit Island was identified by the California Department of Fish and game as an important ESHA, and was shown to be comprised of tertiary sand dunes, grasslands, and Baccharis dominated scrub habitat. The dune habitat of Rabbit Island supports a wildlife population of birds, mammals, and reptiles. Further inland, the Orange County Flood Control District maintains the East Garden Grove-Wintersburg Channel, located in the lowlands adjacent to the Mesa. The flood control channel drains into Outer Bolsa Bay. The majority of the lowland area overlies producing zones of the Huntington Beach oil field.

Though human use of the site has substantially altered the natural character of Bolsa Chica, significant wetland habitat values remain. In 1981 the California Department of Fish and Game (DFG) investigated the status of the Bolsa Chica Wetlands. The Department of Fish and Games noted that a diverse assemblage of plants and animals typical of southern California's tidal wetlands populates the existing wetland habitat. The study states that: *"The 686 acres of non-tidal wetland are, for the most part, seasonal in nature. Winter rains inundate these areas annually, and produce population explosions in invertebrate forage animals such as brine shrimp and salt fly larvae. These invertebrates are fed upon by a large variety of waterfowl and shorebirds. The annual Audubon Christmas bird counts substantiate heavy winter use of these wetlands (listing over 80 species, and between 8,000 and 11,000 individuals, in the past three censuses). The endangered Belding's savannah sparrow is known to utilize much of the pickleweed dominated saltmarsh contained within the 686 acres of degraded wetland. The Department can document either high or moderate wetland habitat values for wetland-associated avifauna on at least 80% of these 686 acres."* Of the remaining 440 acres examined, the DFG concluded *"Were it not for the involvement of dikes, roads, and relatively shallow fills, these 440 acres* ***would be*** *viably functioning wetlands. The roads and fill areas presently function as resting substrate for wetland-associated wildlife, and form narrow ecotones which add to and enhance the diversity of habitat available to wildlife."* (Emphasis added). The Department of Fish and Game concluded that: *"The entire 1,324 acre study area, including 1,292 acres of historic wetland (in which 852 acres still function viably as wetlands), constitutes a fundamentally inseparable wetland system of exceptional value to wildlife."*

The California Department of Fish and Game in a letter of December 10, 1992 reaffirmed its prior finding that the Bolsa Chica wetlands continue to provide significant wildlife values by stating that: *"... the Department determined that the wetlands at Bolsa Chica were, and still are, demonstrably valuable to fish and wildlife resources (most especially to migratory and resident shorebirds, waterfowl, and endangered birds)."* The U.S. Fish and Wildlife Service in a letter dated April 14, 1994 stated that: *"The wetlands of Bolsa Chica are used by tens of thousands of birds each year, ...*". Six endangered or threatened bird species are known to use, or have been reported flying over the site. These birds are the Federally listed California least tern, California brown pelican, light footed clapper rail, peregrine falcon, and the western snowy plover, and a State listed bird the Belding's savannah sparrow. The sparrow population is dependent upon pickleweed habitat. Pickleweed habitat occupies an extensive area of the lowland and includes both full tidal and muted tidal areas. This does not change the fact, however, that the Department of Fish and Game concluded that the Bolsa Chica wetlands, when viewed as an overall system is severely degraded.

Bolsa Chica Mesa consists primarily of non-native grasslands that have been subject to agricultural activities in the past. Additionally Bolsa Chica Mesa contains an environmentally sensitive habitat area (ESHAs) consisting of a Eucalyptus grove and a wetland area known as Warner Pond. The Eucalyptus grove is located at the northwest corner of the Mesa and is approximately 16 acres (LSA Associates, October 6, 1999) in size. The Eucalyptus Grove was planted in the early 1900s. The grove is considered an ESHA since it provides habitat and nest sites for a variety of raptors, particularly red-tailed hawks. The Department of Fish and Game in their report of *"Environmentally Sensitive Habitat Areas at Bolsa Chica*" (1982) notes the presence of eleven raptor species. Species using the grove include the white tailed kite, marsh hawk, sharp-shinned hawk, Cooper's hawk, and osprey. Warner Pond is approximately 1.7 acres and is located on the western edge of the Mesa adjacent to Warner Avenue. Warner Pond provides important wildlife habitat. The pond contains fish and is used by fish eating birds. Warner Pond is used by both the endangered California least tern and California brown pelican.

Huntington Mesa contains open space, which is proposed for low-intensity recreational use as part of the Harriett Wieder Regional Park under this Local Coastal Program. Generally the site can be characterized as a field with a vegetative cover consisting of introduced annual weeds and grasses. Birds inhabiting the site are primarily seed eating species and carnivores, including several species of hawks and a burrowing owl that feed on the small rodents and rabbits.

Huntington Mesa has been used and is currently being used for oil production. John Thomas (previously the Huntington Beach Company) maintains oil wells and support facilities in the Edward's Thumb area. AERA Energy, LLC (previously Shell Onshore Ventures Incorporated (SOVI)) operates oil processing and support facilities located on

the southwestern portion of the mesa adjacent to Pacific Coast Highway. Additionally, Huntington Mesa provides the upland drill site for offshore production from State oil leases. The existing property ownership (2000) at Bolsa Chica is shown on **Figure 6** which is on page 22.

B. LOCAL HISTORY

Throughout the 1800s increasing human use of the surrounding area led to cattle ranching and sheep grazing at Bolsa Chica. By the late 1890s most of Bolsa Chica's marshlands had been sold and converted to agricultural use. Only the tidal marshes along the coastal strip remained relatively unaltered. Extensive alteration to the remaining coastal marshes soon followed due to the formation of hunting clubs and intensive oil development.

The largest hunting club was the Bolsa Chica Gun Club which applied to the State in 1895 for a concession to reclaim the tidal marshes. In 1899, the Gun Club constructed a dam with tide gates extending from the southeast tip of the Mesa to the coastal sand dunes in order to reclaim the marshlands. Urbanization of the area began in the early 1900s. Small resort communities were established that eventually would become the cities of Seal Beach and Huntington Beach.

In 1904 the Huntington Beach Oil Field was discovered. In 1925 oil was discovered beneath Bolsa Chica. Refineries and natural gas plants were in operation by 1936. The Bolsa Chica lowland remained a waterfowl preserve until 1940 when drilling rights were signed over to Signal Oil Company.

During World War II fortifications were built on the Bolsa Chica Mesa. Following World War II, rapid urbanization of the surrounding area had negligible additional impact on Bolsa Chica until 1960, when the State acquired the land for Bolsa Chica State Beach and the Wintersburg Flood Control Channel was constructed. In 1977-1978, the State Ecological Reserve was created by diking the southwestern edge of the project area.

Today, Bolsa Chica remains one of the largest remaining coastal wetlands in southern California. The communities of Sunset Beach and Huntington Beach have developed up to the edge of Bolsa Chica. Bolsa Chica State Beach is located along the southwest border and provides significant recreational benefits. The State Ecological Reserve is located just inland of Pacific Coast Highway. Oil production on the lowland and Huntington Mesa is being phased out as the oil reserves are depleted. Although development has markedly changed Bolsa Chica, the area currently contains substantial and important natural resource values and recreational opportunities.

C. HISTORY OF LAND USE PLANNING

PLANNING BACKGROUND: The history of land use planning for Bolsa Chica is best summarized as complex and controversial. From the beginning the Commission has recognized that the complex problems and interrelationships at Bolsa Chica required the area to be planned as a single integrated unit. Land use planning for Bolsa Chica was initiated in the 1960s. In 1964, the United States Congress authorized the United States Army Corps of Engineers to study the feasibility of a small craft harbor. Additionally, in the late 1960s, the owners of the property began to prepare plans for a marina and a residential complex. In 1970 Signal Bolsa Corporation acquired the surface rights from the prior owners. Shortly after the acquisition of the site by Signal Bolsa, the State of California asserted ownership of the land based on the land's characteristics as historic tidelands subject to the public trust. A compromise was reached in 1973 to settle these two competing claims. The compromise resulted in the State of California receiving 300 acres, which is now managed by the Department of Fish and Game as the Bolsa Chica Ecological Reserve while Signal Bolsa Corporation retained title to the remainder of the site.

In 1977, the County of Orange, in response to a proposal by the City of Huntington Beach, completed a feasibility study for the creation of a linear regional park (now named Harriett Wieder Regional Park) that would connect with Huntington Central Park, the Ecological Reserve, and Bolsa Chica State Beach.

To promote coordinated planning the County of Orange along with other interested agencies and groups formed the Bolsa Chica Study Group in 1978. The Bolsa Chica Study Group reached consensus on three main issues: 1) that the Mesa was suitable for development, 2) that a linear park was desirable on Huntington Mesa, and 3) that wetland restoration would be appropriate for the lowland.

Between November 1980 and December 1981, nine alternative land use plans were developed by Orange County. The alternatives ranged from preservation of almost the entire site to intensive urban and recreational development. Ultimately, Alternative 10 was selected as the adopted plan. Alternative 10 consisted of: a navigable ocean entrance, a visitor serving marina complex with 1,800 boat slips, coastal orientated commercial support facilities, lodging, open space recreation on the lowland, 600 acres of salt marsh restoration, and 5,700 residential units. Of the proposed 5,700 residential units, 2,500 were proposed to be constructed on 335 acres of the Lowland. On January 20, 1982 the Orange County Board of Supervisors approved the land use plan. On April 22, 1982, the Commission found substantial issue with the Bolsa Chica land Use Plan as submitted and opened a public hearing. Additional hearings and Commission discussions took place on June 18, 1982 and July 30, 1982. Further hearings were scheduled for November 1982, but the County of Orange withdrew the land use plan prior to Commission Action. In December 1983, the County resubmitted the land use plan. In

addition, SB 429 was signed into law as Section 30237 of the Coastal Act to provide for the development of a Habitat Conservation plan for Bolsa Chica.

On November 29, 1984 the Commission held a public hearing on the County's Land Use Plan and took the following actions: (1) approved segmentation of the Bolsa Chica area; (2) denied the land use plan as submitted; (3) found substantial issue with the Habitat Conservation Plan submitted by the Coastal Conservancy and the Department of Fish and Game; and (4) certified the land use plan with modifications. As a result, the County revised the Land Use Plan to incorporate the main body of the suggested modifications. This plan was then recirculated for public review and was approved by the Orange County Board of Supervisors on May 22, 1985.

CERTIFIED 1986 LAND USE PLAN: In late May 1985, the County of Orange resubmitted the Bolsa Chica Land Use Plan to the Commission for certification. The Commission held the hearing on the proposed land use plan on October 23, 1985 and approved the resubmitted land use plan with additional suggested modifications and contingent upon the completion of a confirmation process. The confirmation process has never been completed. Figure 10 on page 45 depicts the 1986 Land Use Plan.

In April 1995, the County of Orange submitted to the Coastal staff a document titled "*Bolsa Chica land Use Confirmation Report*". This document contains a detailed analysis of the actions that the County believes fulfilled the 1986 LUP confirmation stage requirements. Subsequent to submitting the "*Land Use Plan Confirmation Report*", Coastal staff advised County staff that the submission did not satisfy requirements of the confirmation process. Based on these consultations, the County determined to proceed with an LUP amendment that is now before the Commission rather then the confirmation stage review.

The certification of the 1986 Land Use Plan contained two land use alternatives, one of which would be adopted. The first was the navigable ocean entrance alternative that depended on the satisfactory completion of the confirmation process. The other alternative was for a non-navigable entrance that would take effect only if the confirmation standards for the first alternative were not satisfied and the County of Orange formally took action to adopt the second alternative. Exhibit A (containing the prior suggested modifications) of the staff report for the 1986 final revised findings certifying LUP contained the following: *"A detailed analysis of the alternative plans for an ocean entrance and channel system, including both non-navigable and navigable options, shall be submitted for the Commission's review and approval at the Land Use Plan Confirmation stage prior to the submission of the Implementation Program."*

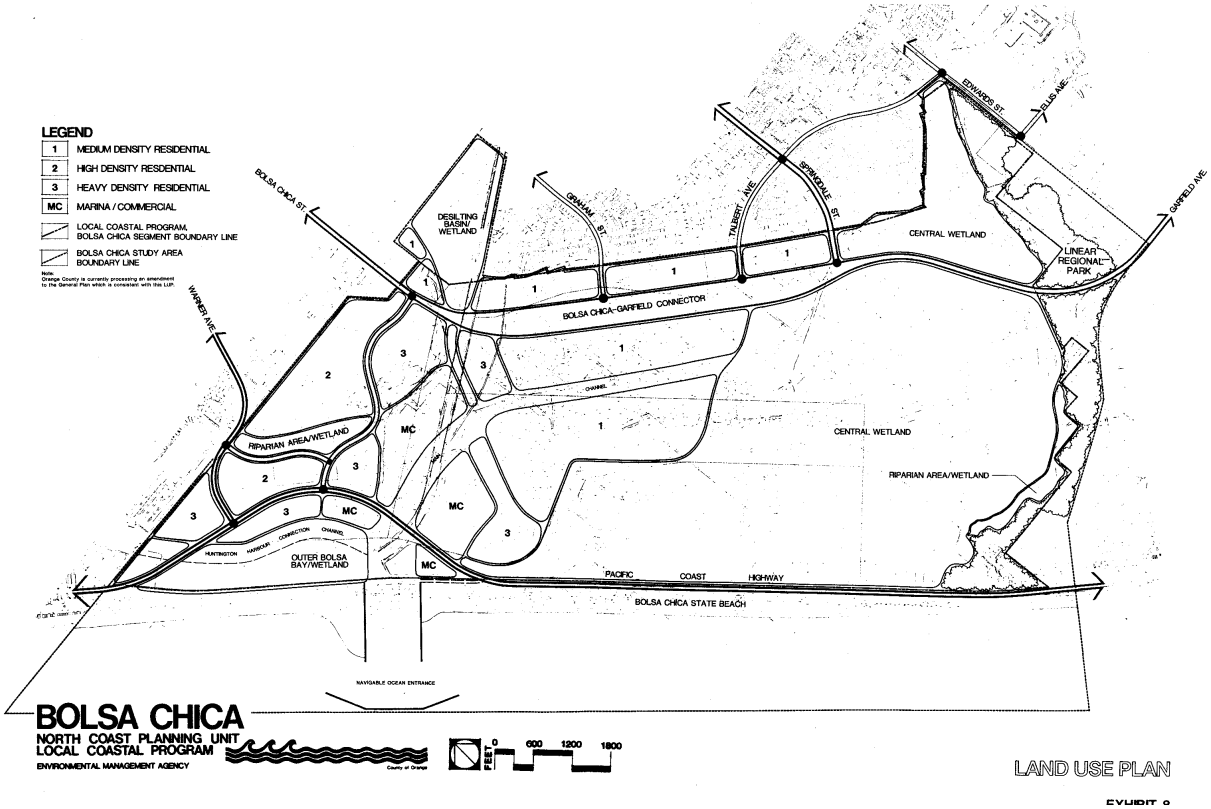
"The analysis shall address all alternatives to determine the least environmentally damaging feasible alternative. The analysis shall detail the environmental and recreation impacts of all alternatives; describe the proposed mitigation measures; and

detail the costs and financing for construction maintenance, and operation of each alternative and its associated mitigation measures."

"Both the Preferred Option and Secondary Alternative for the Land Use Plan as described herein shall be included as explicit alternative plans in the Corps of Engineers Sunset Harbor Study to receive complete analysis and review equal to any other alternative considered."

Subsequent to the certification of the 1986 LUP, the County proceeded with studies of both the Preferred Alternative marina plan and variations on the Secondary Alternative non-navigable ocean entrance alternative. The studies undertaken and the planning actions pursuant to both alternatives are reviewed in the April 1995 County of Orange summary titled "Land Use Plan Confirmation Report" which was submitted to the Commission staff. None of the identified actions necessary for either alternative to become the adopted land use plan were ever completed. Principal components of the County's 1986 Land Use Plan alternatives are shown below.

Figure 10: 1986 Land Use Plan



Principal components of the County's 1986 Land Use Plan alternatives included the following:

- At least 75 acres of mixed-use marina/commercial area providing boat docks and dry storage. Marina uses would total 60 acres. The marina would have 1,300 slips (37 acres). Dry storage for 400 boats (6.5 acres). Other public features include: launch ramps (5 acres), marina parking (7.5 acres), and ancillary marina facilities (4 acres). Ancillary marina facilities include boat sales, rentals, repairs, chandlery, harbor patrol, and fuel dock.

- Visitor serving facilities included a 150 room motel, 85,000 square feet of specialty retail (including 3 restaurants), four freestanding restaurants, active and passive recreation areas, trails to promote public access, and an option for including neighborhood commercial services contiguous to high-density housing. Visitor serving commercial facilities proposed would cover 15 acres. Also identified were coastal dependent commercial opportunities for commercial fishing, sport fishing, and tour boat facilities.

- Approximately 500 gross acres of medium, high, and heavy density residential development in the lowland and on Bolsa Chica Mesa.

- Realignment of Pacific Coast Highway from the existing PCH/Warner Avenue intersection, across Outer Bolsa Bay, Bolsa Chica Mesa and through the proposed marina.

- Creation of the 130 acre Bolsa Chica Linear Regional Park (now named Harriett Wieder Regional Park) on Huntington Mesa and the lowland. The trails with the park would connect with Huntington Central Park, Bolsa Chica State Beach Park, the marina/commercial complex and other regional bicycle and hiking trails.

- 915 acres of restored, high quality, fully functioning full tidal, muted tidal, fresh and brackish water wetlands, with emphasis on diversity of habitat and the protection and recovery of endangered species.

- 86 acres of existing or newly created environmentally sensitive habitat.

- A 600 foot wide fully navigable ocean entrance to provide ocean water to the wetlands and recreational boating opportunities.

- A “Cross Gap Connector” an arterial roadway through the lowland.

BOLSA CHICA PLANNING COALITION: Certification of the 1986 Land Use Plan, however, did not end the planning process. In addition to studies carried out by the County and the landowner in response to the land use confirmation stage requirements established in the 1986 LUP, the Bolsa Chica Planning Coalition (Coalition) was formed in November of 1988 as a result of growing public concern over the potential adverse impacts of the marina and the navigable ocean entrance. The purpose of the Coalition was to develop an alternative land use plan that focused on maximizing restoration of the wetlands. The Coalition was composed of the County, the City of Huntington Beach, the California State lands Commission, the Amigos de Bolsa Chica, and the landowner at that time (The Signal Bolsa Corporation). In May 1989 the Coalition adopted a conceptual land use plan (Figure 11 on page 47).

Figure 11: 1989 Planning Coalition Plan

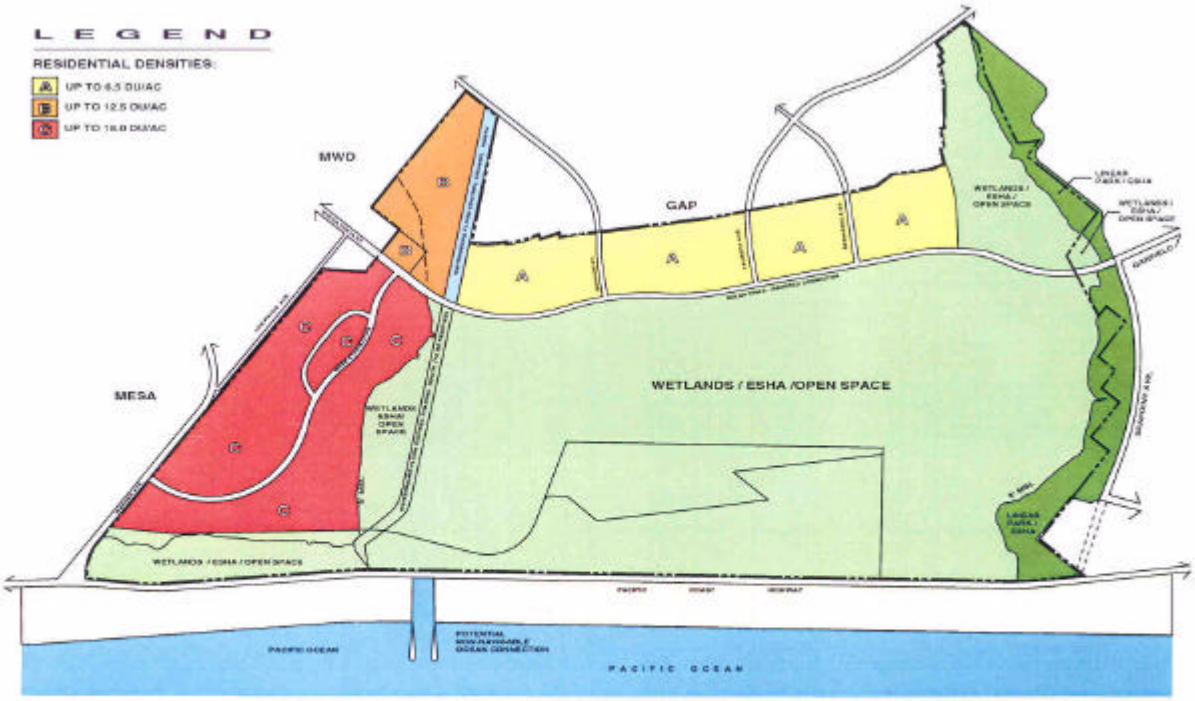


Figure 2.2-1
1989 – BOLSA CHICA PLANNING COALITION CONCEPT PLAN

BOLSA CHICA
LAND USE PLAN

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The Coalition conceptual plan deleted the marina and reduced the amount of residential development, substituted a non-navigable ocean entrance, increased the size of the wetlands to a minimum of 1,000 acres. In consultation with State and Federal agencies and other interested parties; the Coastal Conservancy prepared six alternatives for wetland restoration in 1990, three of which included lowland development and three of which involved no lowland development. The three sets of alternatives embodied a navigable ocean entrance, a non-navigable direct ocean entrance and a Huntington Harbour tidal option. The Coalition accepted alternative 3(b) as the least environmentally damaging feasible alternative capable of restoring the wetlands. This alternative provided for a 1,081 acre wetland ecosystem encompassing full and muted tidal areas, seasonal and perennial ponds, ESHA's and buffers.

The Coalition plan was a concept plan and was never submitted to the Commission for certification. Commission staff did brief the Commission on the plan and attended the Coalition meetings. From the viewpoint of the County, the Coalition's plan and the 1990

Coastal Conservancy wetlands restoration alternatives built upon the Secondary Alternative of the certified 1986 LUP and became the basis for the County's 1995 Bolsa Chica LCP submittal to the Coastal Commission.

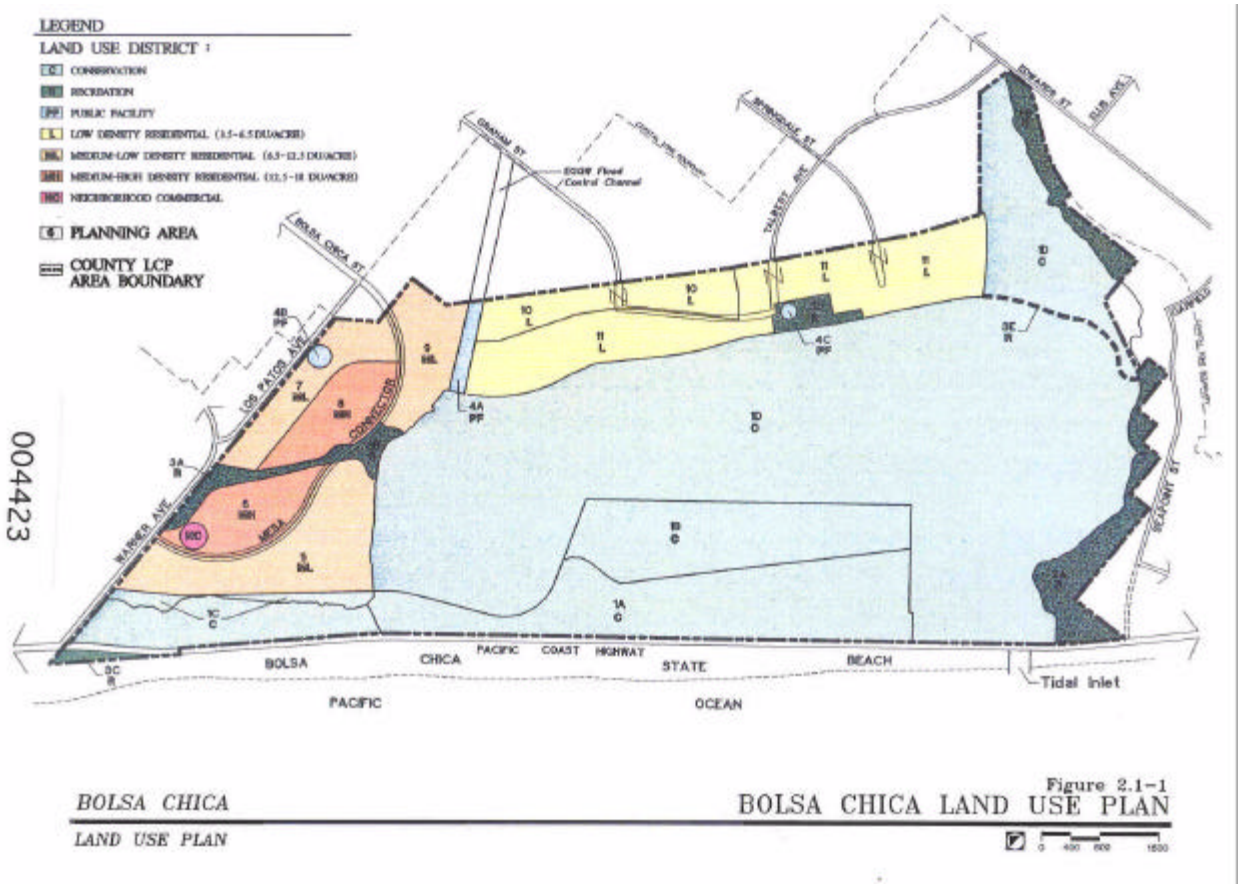
D. DESCRIPTION OF THE LOCAL COASTAL PROGRAM LAND USE PLAN AMENDMENT AS SUBMITTED IN JUNE 1995

The County of Orange submitted to the Commission on June 2, 1995 a proposed Local Coastal program for Bolsa Chica. This section of the report describes the Bolsa Chica LCP as originally submitted by the County. The submittal consisted of an amendment to the Commission certified Land Use Plan of 1986 and an Implementation Program (titled *"Implementing Actions Programs"* by the County of Orange). The amendment to the Land Use Plan as approved, with suggested modifications, by the Commission totally replaces the 1986 Land Use Plan. The Land Use Plan, as submitted, is shown in Figure 12 on page 49. FIGURE 13 on page 51 is a statistical summary of the acreage devoted to each land use category.

The Implementation Program is a new submittal. The Implementation Program consists of a variety of documents. Principal documents include the Planned Community Program, the Wetlands Restoration Program, a Development Agreement, and Section 7-9 of the Orange County Zoning Code. The graphic of the Zoning Map is shown in FIGURE 15 on page 53.

The Local Coastal Program, as submitted, was in support of planned residential development and wetlands restoration at Bolsa Chica. The developer proposed to construct 3,300 homes, build associated infrastructure, and undertake wetland restoration at Bolsa Chica, resulting in a minimum wetland ecosystem of 1,100 acres, which included a non-navigable ocean entrance. The proposed residential development would have resulted in the construction of 2,400 homes on the mesa. The remaining 900 homes would have been constructed on the Lowlands and would have required filling of approximately 104 to 120 acres of degraded wetland depending on the wetland delineation methodology used.

Figure 12: Bolsa Chica Land Use Plan as Submitted



A mix of residential densities was proposed with a variety of product types, including single family detached homes and multiple family attached homes. The residential mix was proposed in two density categories: (1) Medium-Low Density Residential (6.5 to 12.5 dwelling units per acre) and (2) Medium-High Density Residential (12.5 to 18.0 dwelling units per acre). In addition, a ten (10) acre Neighborhood Commercial area was proposed for possible development on the Bolsa Chica Mesa depending on the feasibility of such a development. It was anticipated that the site would accommodate up to 100,000 square feet of neighborhood commercial development, if constructed.

Infrastructure improvements associated with the LCP, as submitted, included the creation of an internal road system, utilities, an area traffic improvement plan (ATIP), improvements to the Wintersburg Flood Control Channel, a water storage reservoir, a fire station, and non-navigable ocean entrance that would have been 250 feet wide with 480 foot long jetties.

Recreation and open space improvements associated with the LCP, as submitted, included a 17 acre Mesa Community Park, an 8 acre lowland Community Park, 290 free

public parking spaces, the conveyance of 49 acres of land to the County for the Harriett Wieder Regional Park, a Kayak/Canoe interpretive facility, nature trails (2.1 miles), and bike and pedestrian trails (8.8 miles).

- The LCP, as submitted, would have left 1,098 acres (consisting of wetlands, ESHA, and buffers) designated for Conservation and subject to a Wetlands Restoration Program. Additionally, new wetlands were to be created within the buffer areas but are not counted as part of the restored wetlands system. Twenty acres of ESHA would have been created within Harriet Wieder Regional Park to mitigate for loss of the Eucalyptus grove ESHA. The wetland ecosystem area was to comprise four different hydrologic regimes; ranging from full and muted tidal areas, to perennial and seasonal ponds. The resulting wetland ecosystem was anticipated to total a minimum of 1,100 acres. The developer proposed to finance the restoration effort through the collection of approximately $48,400,000 derived from the sale of residential units constructed. Part of the $48,400,000 obligation was to be realized through a $7,000,000 “Mesa Conservation Fund” derived from the sale of residential units located on the Mesa. The remainder ($41,400,000) would have been funded through lowland residential development.

  However, the majority of the lowland (except for the Fieldstone property and Edward’s Thumb) has since been acquired by the State of California. Consequently lowland residential development is no longer proposed and a task force has undertaken the formulation of a new wetland restoration program to be funded by the Ports of Long Beach and Los Angeles. The wetland restoration task force issued a draft EIR/EIS in July 2000 for wetland restoration. The developer sponsored wetland restoration program (which was to be funded by lowland residential development), as submitted, has therefore been deleted from the Bolsa Chica Local Coastal Program. A summary of the changes in circumstances since the original submittal of the LCP are provided beginning on page 16.

FIGURE 13: LAND USE SUMMARY (TABLE 2-1, AS SUBMITTED)

Bolsa Chica Land Use Plan

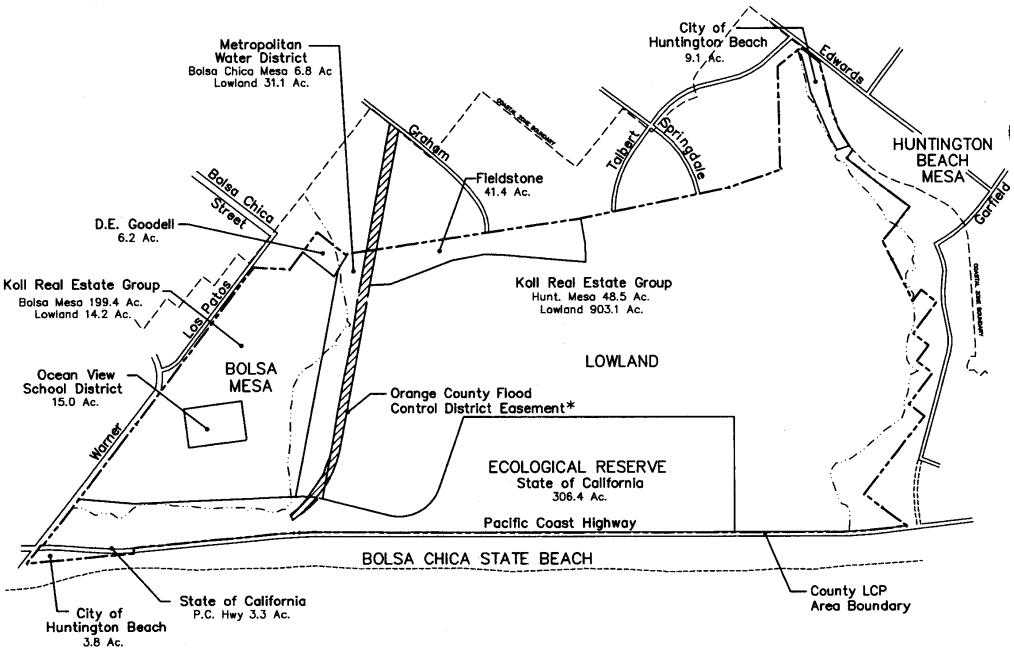
LAND USE CATEGORY		PLANNING AREA	GROSS ACRES
CONSERVATION:			
C	Existing Ecological Reserve	1A, 1B, 1C	307
C	Central Lowland	1D	791
TOTAL CONSERVATION		**--**	**1,098 Acres**
RECREATION:			
R	Bolsa Chica Regional Park	2A, 2B	57
R	Mesa Community Park	3A, 3B	17
R	Beach Entry	3C	4
R	Lowland Community Park	3D	8
R	Trail (Boardwalk)	3E	1
TOTAL RECREATION		**--**	**87 Acres**
PUBLIC FACILITY:			
PF	EGGW Flood Control Channel	4A	6
PF	Water Storage Reservoir	4B	2
PF	Fire Station	4C	1
TOTAL PUBLIC FACILITIES		**--**	**9 Acres**
RESIDENTIAL			
BOLSA CHICA MESA:			
ML	Medium Low (6.5 - 12.5 DU/Ac.)[a]	5, 7, 9	144
MH	Medium High (12.5 - 18 DU/Ac.)[a]	6[b], 8	71
NORTHEAST LOWLAND:			
L	Low Density (3.5 - 6.5 DU/Ac.)	10, 11	176
TOTAL RESIDENTIAL[c]		**--**	**391 Acres[c]**
PACIFIC COAST HIGHWAY		**--**	**3 Acres**
GRAND TOTAL		**ALL**	**1,588 Acres**

(a) Categories of residential density are based upon gross acres, including roads, common recreation facilities, slopes, and landscape areas.

(b) Neighborhood Commercial facilities, not to exceed 10 acres, may be included within Medium High Density Residential Planning Area 6, consistent with Chapter 5 of the Bolsa Chica Planned Community Program, Zoning Code Section 7-9-89, and the Orange County General Plan.

(c) The maximum total number of dwelling units for the Bolsa Chica LCP Land Use Plan shall be 3,300.

FIGURE 14: PROPERTY OWNERSHIP IN 1994



LEGEND

COUNTY LCP AREA BOUNDARY

LOWLAND / UPLAND (MESA) DIVISION BOUNDARY-APPROX.

* OCFDC Easement (22.7 Acres) included in other acreage figures:

17.5 AC. – Koll Real Estate Group
2.0 AC. – Metropolitan Water District
3.2 AC. – State of California

ACREAGE BY OWNERSHIP	County LCP Area
Koll Real Estate Group:	
• Bolsa Chica Mesa	199.4
• Lowland North of OCFCD Easement	14.2
• Lowland South of OCFCD Easement (inc. easement)	903.1
• Huntington Beach Mesa	48.5
Subtotal:	1,165.2
State of California:	
• Ecological Reserve	306.4
• Pacific Coast Highway	3.3
Subtotal:	309.7
City of Huntington Beach:	
• Huntington Beach Mesa near Edwards	9.1
• Pacific Coast Highway and Warner Ave.	3.8
Subtotal:	12.9
Metropolitan Water District (MWD):	
• Bolsa Chica Mesa	6.8
• Lowland	31.1
Subtotal:	37.9
Fieldstone Company	41.4
Ocean View School District	15.0
D.E. Goodell	6.2
TOTAL	1,588.3

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Figure 1.2-4

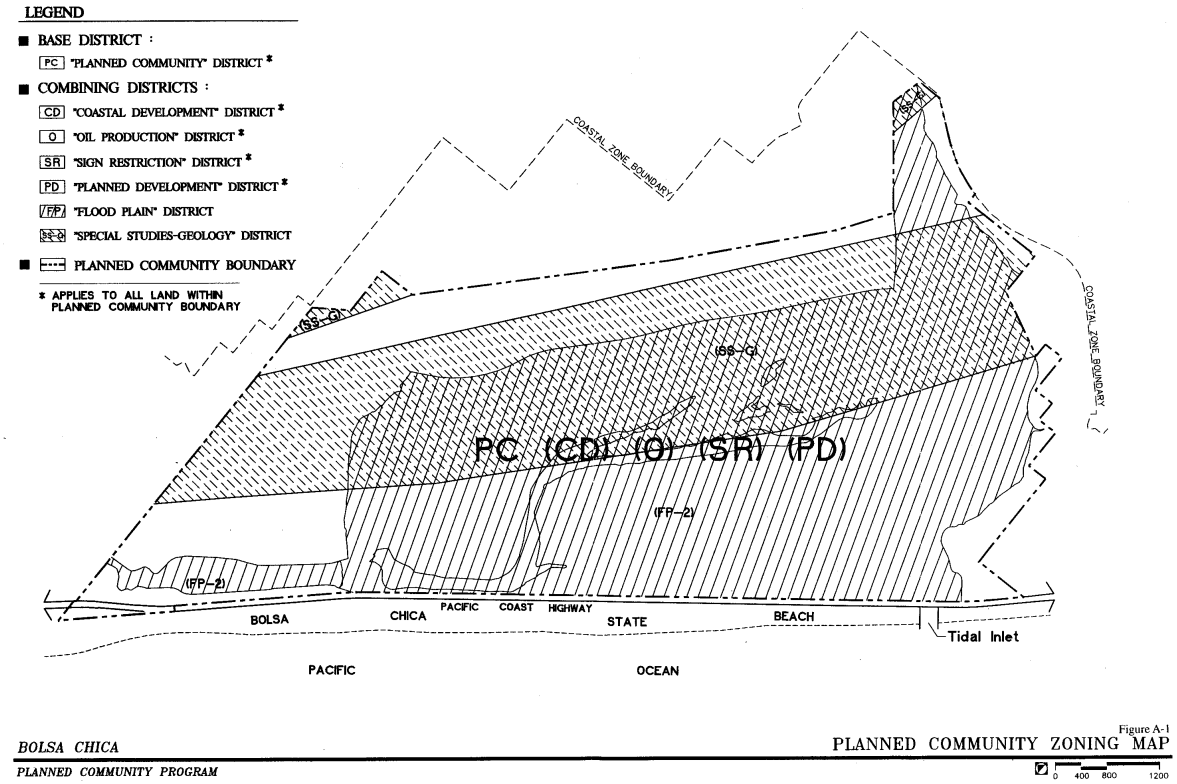
BOLSA CHICA

PROPERTY OWNERSHIP

LAND USE PLAN

0 500 1000 2000

FIGURE 15: ZONING MAP AS SUBMITTED



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V. SUMMARY OF PUBLIC PARTICIPATION

The County of Orange held eight public hearings. Seven of the hearings were held before the Planning Commission. The eighth hearing was held before the Orange County Board of Supervisors. The hearings were for both the proposed Bolsa Chica Local Coastal program and EIR No. 551 on the proposed development. The public review period for the Revised Draft EIR (August 22, 1994) was for 45 days and ran from August 23, 1994 to October 6, 1994. Comments received from the public on the Revised EIR No. 551 and the responses from the County of Orange are contained in the Final version of Revised EIR No. 551. The public comment period on the proposed LCP was for 45 days and ran from September 30, 1994 to November 14, 1994. Listed below are the hearing dates for both the Local Coastal Program and the EIR.

PLANNING COMMISSION EIR/LCP HEARINGS

- September 21, 1994 (historical background and overview)
- September 28, 1994 (public comments on the LCP and EIR)
- October 12, 1994 (wetland restoration)
- October 24, 1994 (tidal inlet and transportation)
- November 9, 1994 (schools and archaeology)
- November 21, 1994 (all EIR issues)
- November 30, 1994 (EIR certification and LCP approval)

BOARD OF SUPERVISORS EIR/LCP HEARING

- December 14, 1994

Numerous comments were received from the public during both the EIR and LCP public comment periods. Comments received were highly divergent and varied from those highly in favor of the project to those adamantly opposed. The public comments received are summarized below.

Those in **SUPPORT** of the proposed development expressed the following:

- Restoration of the wetlands would occur at no cost to the public.
- Economic growth through job creation from construction and tourism.
- Improved housing.
- Improved parks and recreational opportunities.
- Balances economic growth and environmental protection.
- The non-navigable ocean entrance would provide the ocean water necessary to restore historical tidal action and to ensure wetland restoration.

Those **OPPOSED** to the proposed development expressed the following:

- Not consistent with Federal and State policies advocating no net loss of wetlands and prohibitions on the fill of wetlands for residential development.
- Loss of open space that should be preserved as natural habitat instead of urban development. Development of the site would destroy the integrity of the ecosystem and would adversely alter the distribution and diversity of the affected species. Additionally the introduction of household pets would have an adverse impact on the remaining wildlife.
- The biological analysis and proposed mitigation measures are inadequate.
- Tidal inlet would pose a health hazard by allowing contamination from the flood control channel to affect Bolsa Chica State Beach.
- Development would result in the destruction of significant cultural resources, such as cogstones and human remains, which have been discovered on the site.
- The site has significant geohazards since the Newport-Inglewood fault extends through the site and the site is near sea level. Potential geohazards include: flooding, liquefaction, and seismic activity.
- Lack of adequate infrastructure. This includes: vehicular overloading of Pacific Coast Highway, possible congestion on other existing roads, lack of schools, and lack of public libraries.
- Alternatives exist which are environmentally superior and accomplish the same project objectives. These alternatives include a land swap, acquisition of the lowlands, establishing a mitigation bank for the lowlands.

Additionally two hearings were held on the Development Agreement. One hearing on the Development Agreement was with the Planning Commission on March 22, 1995. The public was notified of this hearing on March 11, 1995. The other was with the Orange County Board of Supervisors on April 18, 1995. The public was notified of this hearing on April 7, 1995.

VI. LAND USE PLAN SUGGESTED MODIFICATIONS

Suggested Modifications: The Commission certifies the following, with modifications as shown. Language as submitted by Orange County is shown in straight type**.** Language recommended by the Commission for ~~deletion~~ is shown in ~~line out~~. Language proposed to be ***inserted*** by the Commission is shown in ***underlined boldface italics***. **ALL THE LAND USE PLAN POLICIES ARE SHOWN EVEN IF THE COMMISSION HAS NOT PROPOSED SUGGESTED MODIFICATIONS**.

The County policy numbers (are shown in enclosed italics at the end of each policy) conform to the Bolsa Chica Local Coastal Program that is dated December 14, 1994. Policy numbers are "*built*" by taking the chapter number and adding the policy number. For example the public access and visitor serving chapter number is "*4.2*" (Page 79). The first policy in this chapter will have the number "*4.2.1*". New policies added by the Commission through suggested modifications are identified by word "*new*" enclosed in parentheses at the end of the new policy.

The addition of new policies or the deletion of policies (as submitted) will affect the numbering of subsequent Land Use Plan policies when the County of Orange publishes the final Bolsa Chica LCP incorporating the Commission's suggested modifications. For purposes of clarity, the numbers shown to the left of each policy have been revised to reflect the final number without the applying formatting to show strike through or insertion. Consequently, the final policy number will consist of the chapter number added to number shown on the left margin. For example the Visual and Scenic Resources Polices are located in Chapter 3.5.2. The last policy number as shown on the left margin for this section is "*15*" so the final full policy number is "*3.5.2.15*". As originally submitted this policy was numbered "*3.5.2.20*". (Page 78)

Additionally the Land Use Plan policies incorporate changes made to department names and titles as a consequence of a reorganization by the County of Orange. As part of the Executive Director's review for effective certification of the Bolsa Chica Local Coastal Program document, Commission staff will also review the LCP findings made by the County of Orange (in the Introduction and Technical Plans and Information sections of each chapter) to assure that they are consistent with the policies modified by the Commission. Below are the suggested modifications.

A. LAND USE PLAN SUMMARY
CHAPTER 2 OF THE LAND USE PLAN AMENDMENT

Graphic Suggested Modification: Figure 2.1-1 of the submitted LCP which shows the Land Use Plan and all figures and text based on the Land Use Plan (Figure 2.1-1) contained in the Bolsa Chica Local Coastal Program of December 14, 1994 shall be modified to conform to **Figure 1** (Page 5) of this staff report. Consistent with the suggested modifications, the ten acre school site shall be designated "Public Facility", the former Fieldstone parcel shall be designated "Conservation", the lower bench shall be designated "Conservation" and the reference to residential density shall be modified to "High" density. The land use designation "Recreation" shall be changed to "Open Space and Recreation". Since this policy refers to a graphic revision, once the graphic revisions are made, this policy does not need to be included in the amended Land Use Plan.

Graphic Suggested Modification: Table 2-1 of the submitted LCP which shows the Land Use Summary and all figures and text based on the Land Use Summary (Table 2-1) contained in the Bolsa Chica Local Coastal Program of December 14, 1994 shall be modified to conform to the Land Use Plan as shown in **Figure 1** (Page 5) of this staff report. Since this policy refers to a graphic revision, once the graphic revisions are made, this policy does not need to be included in the amended Land Use Plan.

Global Text Suggested Modification: Due to a renaming of the Orange County Environmental Management Agency, all text in the Land Use Plan which cites the "*Environmental Management Agency*" or "*EMA*" shall be revised to either "Planning and Development Services" or "PDSD". Any other name revisions shall also be made as required to make the LCP consistent with current department names. Since this policy refers to a global text revision, once the global text revisions are made, this policy does not need to be included in the amended Land Use Plan.

B. RESOURCE RESTORATION AND CONSERVATION COMPONENTS

CHAPTER 3 OF THE LAND USE PLAN AMENDMENT

3.0 GENERAL RESOURCE PROTECTION POLICIES

The following general policies shall provide the framework for interpreting this Land Use Plan (LUP):

1. Where policies within the LUP ~~overlap~~ ***conflict***, the policy which is the most protective of coastal resources shall take precedence.

2. Where there are conflicts between the policies set forth in this LUP and those set forth in any element of the Orange County General Plan, other County plans, or existing ordinances, the policies of this LUP shall take precedence.

3. In the event of any ambiguities or silence of this LUP not resolved by (1) or (2) above, or by other provisions of the Bolsa Chica LCP, the policies of the California Coastal Act shall guide interpretation of this LUP.

3.1.2 WETLANDS/BIOLOGICAL RESOURCE POLICIES

WETLANDS ECOSYSTEM AREA ~~ZONING POLICY~~ ***POLICIES***

1. ~~The Wetlands Ecosystem Area shall be designated as one or more Conservation Planning Areas on the Development Map of the Bolsa Chica Planned Community Program. This land use district (zone) shall allow the restoration, creation, and protection of wetlands, ESHAs, and Buffers, as well as public access for wildlife interpretation, education, and scientific study. To facilitate implementation of the Wetlands Restoration Program, this LUP shall provide for low density residential development on the northeasterly approximately 185-acre portion of the Lowland adjacent to existing residential areas of Huntington Beach, including appropriate local parks, trails, community facilities and similar supporting uses. All Conservation Planning Areas shall be offered for dedication to the County or other approved agency or organization, subject to the approval of the County Board of Supervisors, and the Coastal Commission Executive Director. In addition, the Landowner/Master Developer shall guarantee funding for the Wetlands Restoration Program~~. *(County Policy 3.1.2.1)*

   The Wetlands Ecosystem Area is comprised of all of Planning Areas 1A, 1B, and 1D (which includes the Edwards Thumb area) and the former Fieldstone Property as shown in County Figure 2.1-1[11]. All lands in the Wetlands Ecosystem Area shall be designated as Conservation on the Development Map of the Bolsa Chica Planned Community Program. This land use district (zone) shall allow: the restoration, creation, and protection of wetlands, ESHAs and buffers; public access for wildlife interpretation, education, and scientific study, incidental public service purposes, including but not limited to, burying cables and pipes; and on an interim basis, oil production where it currently exists.

   Prior to issuance of any coastal development permit for any subdivision of the Bolsa Chica LCP area, the private landowner shall irrevocably offer to dedicate to the County of Orange or other public agency a conservation easement over all areas owned by the private property owner which are designated as Conservation in Figure 2.1-1.

[11] The version of Figure 2.2-1 cited is the County's November 2000 graphic **Figure 4** on page 19, not the figure as originally submitted.

WETLAND RETORATION PROGRAM

Wetland Restoration within the Wetlands Ecosystem Area shall occur consistent with the Chapter 3 Policies of the Coastal Act.

~~OVERALL DESIGN STANDARDS AND ACREAGE REQUIREMENT POLICY~~

~~2. The Wetlands Restoration Program shall meet the following overall design objectives:~~

~~a. Creation of new tidal inlet, providing a direct ocean water source and tidal influence.~~

~~b. Establishment of a minimum of 1,000 acres of high-quality, fully-functioning wetlands, providing enhanced biological productivity and habitat diversity on-site;~~

~~c. Protective buffering between habitat areas and adjacent proposed development;~~

~~d. The creation of new least tern nesting habitat;~~

~~e. Design concepts that are consistent with low capital and operation costs;~~

~~f. Mutual compatibility of public and private improvements, including oil production facilities;~~

~~g. Establishment of criteria for evaluating success of wetlands and ESHA restoration;~~

~~h. Protection and/or restoration of endangered species habitat;~~

~~I. Assurance of water of sufficient quality and quantity to provide for improved productivity in the wetlands; and~~

j. ~~Compensation of fish and wildlife habitats in the form of replacement habitat that duplicates or surpasses any wildlife values lost.~~
(County Policy 3.1.2.2)

HYDROLOGIC REGIMES POLICY

2. ~~The Wetlands Restoration Program~~ ***Wetland restoration within the Wetlands Ecosystem Area*** shall provide requirements for the design of hydrologic regimes which ***are consistent with the Chapter 3 Policies of the Coastal Act.*** ~~Provide habitat diversity and include:~~

   ~~a. Full Tidal Areas;~~
   ~~b. Muted Tidal Areas;~~
   ~~c. Seasonal Ponds Areas; and~~
   d. ~~Perennial Pond Area.~~ *(County Policy 3.1.2.3)*

ENVIRONMENTALLY SENSITIVE HABITAT AREAS (ESHAS) POLICIES

3. ~~The Wetlands Restoration Program shall provide for the preservation and/or restoration of a minimum of 65 acres of Environmentally Sensitive Habitat Area within the Wetlands Ecosystem Area~~.

   Except for the ten (10) acre school site depicted as Public Facility on Figure 2.1-1, the lower bench of the Bolsa Chica Mesa, shall be designated as Conservation. The Eucalyptus Grove ESHA and the Warner Avenue Pond ESHA shall be preserved. Prior to issuance of any coastal development permit for any subdivision of the Bolsa Chica LCP area, the private landowner/master developer shall irrevocably offer to dedicate to the County of Orange or other public agency a conservation easement over all areas owned by the landowner/master developer which are designated as Conservation in Figure 2.1-1 that are owned by the landowner.
   (County Policy 3.1.2.4)

~~5. The Wetlands Restoration Program shall provide for the planting of a minimum 20-acre native tree and shrub ESHA along the Huntington Mesa to compensate for the loss of a eucalyptus grove on the Bolsa Chica Mesa.~~ *(County Policy 3.1.2.5)*

4. ***Wetlands that are outside of the Wetlands Ecosystem Area shall be preserved, and where feasible restored, except for the seasonal wetland on the upper bench of the Bolsa Chica Mesa adjacent to Los Patos which can be filled in conjunction with an overall development plan that concentrates residential development on the upper bench of the Bolsa Chica Mesa and locates the school site as depicted in Figure 2.1-1.*** ***(NEW)***

5. ***Environmentally sensitive habitat areas shall be protected against any significant disruption of habitat values, and only uses dependent on those resources shall be allowed within those areas. (NEW)***

6. ***Development in areas adjacent to environmentally sensitive habitat areas and parks and recreation areas shall be sited and designed to prevent impacts which would significantly degrade those areas, and shall be compatible with the continuance of those habitat and recreation areas. (NEW)***

7. ***At the time of submittal of any coastal development permit for residential development on the Mesa, including any proposed subdivision of the Mesa, the landowner/Master Developer shall submit a long term habitat management plan for all areas owned by the applicant on or adjacent to the Bolsa Chica Mesa which are designated as buffer, Conservation, or Open Space and Recreation. This long term management plan shall be prepared in consultation with the California Department of Fish and Game (CDFG) and the U.S. Fish and Wildlife Service. This long term management plan shall, at a minimum, provide for:***

   a. Landscaping provisions which include maintenance of the viability of the Eucalyptus tree ESHA, initial and continued weed eradication, and the removal of exotic plants and non native species which are invasive and considered inappropriate by CDFG & USFWS.

   b. Provisions for protecting natural resources from domesticated pets and unauthorized human entry.

   c. Provisions for public education such as public interpretive signs and brochures for homeowners advising them on how to avoid using plants and animals which could affect the ecology of the Conservation planning areas.

   d. Provisions for a fence separating the conservation areas from both the trail and residential area on the upper bench and the interpretive trail along the edge of the Fish and Game Reserve. Each fence shall prevent normal access by humans and dogs and shall be a minimum of 4 feet in height with a solid top between posts. Each fence shall be constructed of a sturdy, long-lasting wire material such as chain link and shall extend 6 inches below the ground surface. Adjacent to the Fish and Game reserve, the bottom of the fence may be

as much as 12 inches above the ground surface if dogs are prohibited on the trail and upon approval of the CDFG and USFWS.

e. Provisions which restrict access from the lowlands to the south into the Eucalyptus tree ESHA and adjacent upland areas. Unless there are other effective provisions on adjacent lands to prevent access, the Eucalyptus tree ESHA shall be separated from the adjacent lowlands by a chain link fence a minimum of 7 feet in height. Portions of the bottom of the fence may be up to 18 inches above the ground surface to allow access by small mammals.

f. Provisions which ensure that native shrubs appropriate to the area shall be planted on both sides of all fences adjacent to trails or residential areas to further restrict access.

g. Provisions for an irrevocable offer of dedication of an open space and conservation easement over all areas designated as Conservation in Figure 2.2-1prior to issuance of any coastal development permit for subdivision of the LCP area.

h. The landowner/Master Developer shall implement all management measures prior to issuance of any coastal development permit for residential construction other than grading. The landowner/Master Developer shall have management responsibility until the offer(s) of dedication are accepted. Any accepting public agency will have long-term management responsibility after any offers of dedication are accepted.

8. ***The diking, filling, or dredging of open coastal waters, wetlands, estuaries, and lakes shall be permitted, where there is no feasible less environmentally damaging alternative, and where feasible mitigation measures have been provided to minimize adverse environmental effects, and shall be limited to the following:***

a. New or expanded port, energy, and coastal-dependent industrial facilities, including commercial fishing facilities.
b. Maintaining existing, or restoring previously dredged, depths in existing navigational channels, turning basins, vessel berthing and mooring areas, and boat launching ramps.
c. In wetland areas only, entrance channels for new or expanded boating facilities; and in a degraded wetland, identified by the Department of Fish and Game pursuant to subdivision (b) of Section 30411, for

boating facilities if, in conjunction with such boating facilities, a substantial portion of the degraded wetland is restored and maintained as a biologically productive wetland. The size of the wetland area used for boating facilities, including berthing space, turning basins, necessary navigation channels, and any necessary support service facilities, shall not exceed 25 percent of the degraded wetland.

d. In open coastal waters, other than wetlands, including streams, estuaries, and lakes, new or expanded boating facilities and the placement of structural pilings for public recreational piers that provide public access and recreational opportunities.

e. Incidental public service purposes, including but not limited to, burying cables and pipes or inspection of piers and maintenance of existing intake and outfall lines.

f. Mineral extraction, including sand for restoring beaches, except in environmentally sensitive areas.

g. Restoration purposes.

h. Nature study, aquaculture, or similar resource dependent activities. (NEW)

9. ***Dredging and spoils disposal shall be planned and carried out to avoid significant disruption to marine and wildlife habitats and water circulation. Dredge spoils suitable for beach replenishment shall be transported for such purposes to appropriate beaches or into suitable long shore current systems. (NEW)***

10. ***The diking, filling, or dredging in existing estuaries and wetlands shall maintain or enhance the functional capacity of the wetland or estuary. Any alteration of coastal wetlands identified by the Department of Fish and Game, including, but not limited to, the l9 coastal wetlands identified in its report entitled, "Acquisition Priorities for the Coastal Wetlands of California", shall be limited to very minor incidental public facilities, restorative measures, and nature study. (NEW)***

11. ***Erosion control and flood control facilities constructed on water courses can impede the movement of sediment and nutrients that would otherwise be carried by storm runoff into coastal waters. To facilitate the continued delivery of these sediments to the littoral zone, whenever feasible, the material removed from these facilities shall be placed at appropriate points on the shoreline in accordance with other applicable provisions of the Coastal Act and where feasible mitigation measures have been provided to minimize adverse environmental effects. Aspects that shall be considered before approving a coastal development permit for such purposes are the***

method of placement, time of year of placement, and sensitivity of the placement area. (NEW)

BUFFER AND TRANSITION POLICIES

12. ~~Consistent with the CDFG findings that buffers reduce disturbance from adjacent urban development (CDFG, April 8, 1985), the Wetlands Restoration Program shall set design requirements to establish buffers between hydrologic regimes (habitat areas) and adjacent new urban development. The buffers may consist of native vegetation and landscape areas, open water and mudflats, rip-rap and/or other shoreline protection, open unvegetated areas, and public interpretive trails.~~

    Buffers shall provide a transition zone between the resources to be protected and urban development. Buffer areas are not in themselves a part of the environmentally sensitive habitat area to be protected. The land use designation of all buffer areas shall be Conservation or Open Space and Recreation. Only native plants shall be allowed within buffer areas unless otherwise recommended by either the California Department of Fish and Game or the U.S. Fish and Wildlife Service. The buffer on the Bolsa Chica Mesa upper bench overlooking the lowland shall extend inland one-hundred feet from either the Eucalyptus grove ESHA or the edge of the top-of-bluff, whichever is the greatest distance. The buffer separating the lower bench from the upper bench shall extend from the top edge, fifty-feet into the upper bench. *(County Policy 3.1.2.6)*

~~7. The Wetlands Restoration Program shall set design requirements for transitions between the hydrologic regimes of the restoration plan.~~
(County Policy 3.1.2.7)

~~PUBLIC ACCESS AND INTERPRETATION POLICIES~~

~~8. The Wetlands Restoration Program shall include coastal access to provide public viewing, wildlife interpretation, and educational opportunities within and on the perimeter of the Wetlands Ecosystem Area. Such access shall be consistent with resource protection needs, and designed in coordination with the California Department of Fish and Game.~~ *(County Policy 3.1.2.8)*

~~11. The Wetlands Restoration Program shall provide for scientific research and educational opportunities within the Wetlands Ecosystem Area, where it is consistent with both wetlands monitoring and maintenance activities, and other public coastal access programs.~~ *(County Policy 3.1.2.9)*

~~IMPLEMENTATION AND PHASING POLICIES~~

~~10. The Wetlands Restoration Program shall provide implementation requirements for the restoration of wetlands, ESHAs, and Buffers. It shall establish:~~

~~a. Types and extent of various wetlands ecosystem habitats;~~

~~b. A Master Phasing Plan which coordinates wetlands restoration with the diminishing of oil production;~~

~~c. Additional sources of ocean water needed to restore the habitats;~~

~~d. Regulatory requirements for implementation;~~

~~e. Responsibilities for the ownership and management of restored areas; and~~

~~f. Responsibilities for the conservation, monitoring, and maintenance of created and restored areas~~. *(County Policy 3.1.2.10)*

~~11. The Wetlands Restoration Program shall include a detailed phasing program. It shall include a precise description of the kinds, locations and intensities of uses of each phase of restoration. The Phasing Program shall be consistent with the following LUP phasing concepts:~~

~~a. There shall be no net loss of wetlands or ESHA within the Wetlands Ecosystem Area. Specifically, the area of functioning wetlands and ESHAs shall at no time be less than 852 acres and 65 acres, respectively;~~

~~b. Grading and construction activities shall avoid impacts to Endangered and Threatened Species during the nesting/breeding season;~~

~~c. Consistent with the wetlands design criteria established by the California Department of Fish and Game (CDFG Report, April 8, 1985), the area of pickleweed saltmarsh shall not be less than 200 acres at any time during permitted wetlands restoration/urban development to ensure that the carrying capacity for the Belding's savannah sparrow is not reduced as a result of permitted activities; and~~

~~d. The Wetlands Ecosystem Area shall be restored in phases which are consistent with and dependent upon the depletion of existing oil recovery operations in the Lowland.~~

e. ~~All development impacts to the Bolsa Chica Wetlands shall be mitigated within the Wetlands Ecosystem Area.~~ *(County Policy 3.1.2.11)*

~~Monitoring and Maintenance Policy~~

~~12. The Wetlands Restoration Program shall outline procedures and provide regulations that require three (3) specific monitoring and maintenance programs:~~

~~a. Construction-Period Monitoring and Maintenance Program;~~

~~b. Post-Construction Monitoring and Maintenance Program; and~~

~~c. Long-Term Monitoring and Maintenance Program.~~
(County Policy 3.1.2.12)

3.2.2 COASTAL/MARINE RESOURCES POLICIES

GENERAL MARINE POLICIES

1. ***Marine resources shall be maintained, enhanced, and where feasible, restored. Special protection shall be given to areas and species of special biological or economic significance. Uses of the marine environment shall be carried out in a manner that will sustain the biological productivity of coastal waters and that will maintain healthy populations of all species of marine organisms adequate for long-term commercial, recreational, scientific, and educational purposes. (NEW)***

2. ***The biological productivity and the quality of coastal waters, streams, wetlands, estuaries, and lakes appropriate to maintain optimum populations of marine organisms and for the protection of human health shall be maintained and, where feasible, restored through, among other means, minimizing adverse effects of waste water discharges and entrainment, controlling runoff, preventing depletion of ground water supplies and substantial interference with surface water flow, encouraging waste water reclamation, maintaining natural vegetation buffer areas that protect riparian habitats, and minimizing alteration of natural streams. (NEW)***

3. ***Revetments, breakwaters, groins, harbor channels, seawalls, cliff retaining walls, and other such construction that alters natural shoreline processes shall be permitted when required to serve coastal-dependent uses or to protect existing structures or public beaches in danger from erosion, and***

***when designed to eliminate or mitigate adverse impacts on local shoreline sand supply*. (NEW)**

TIDAL INLET AND HYDROLOGY POLICIES

4. ~~The Tidal Inlet~~ ***Any tidal inlet*** and the hydraulic regimes for the Wetlands Ecosystem Areas shall be ***consistent with the Chapter 3 policies of the Coastal Act.*** ~~designed to:~~

~~a. promote tidal circulation;~~

~~b. minimize, to the extent possible, effects on exiting recreational facilities and opportunities at Bolsa Chica State Beach;~~

~~c. promote new recreation and interpretive opportunities; and~~

d. ~~mitigate, to the extent feasible, anyadverse impacts on upcoast and downcoast beaches to a level of insignificance.~~
(County Policy 3.2.2.1)

~~2. A maintenance and monitoring program shall:~~

~~a. provide for the removal of sediment in the Tidal Inlet and Full Tidal areas of the wetlands;~~

~~b. mitigate for the increased operation and maintenance costs for the Tidal Inlet that otherwise would accrue to the County or other managing agency-approved organization; and~~

~~c. determine specific responsibilities for operation, maintenance and liability for the Tidal Inlet and related mitigations~~. *(County Policy 3.2.2.2)*

WATER QUALITY MANAGEMENT POLICIES

5. ~~A Water Quality Management Plan (WQMP) shall be prepared for the Bolsa Chica Planned Community in accordance with Orange County's Drainage Area Management Plan, and Chapter 2 of the Bolsa Chica Planned Community Program~~.

As part of any coastal development permit application which includes grading and/or construction, including development of backbone infrastructure in the Bolsa Chica LCP area, a Water Quality Management

Plan (WQMP) shall be prepared by the landowner/developer. The WQMP shall be submitted prior to filing the coastal development application as complete.
The Water Quality Management Plan (WQMP) shall be consistent with the water quality policies and other applicable resource management polices of the Bolsa Chica Local Coastal Program. The WQMP shall identify specific source and treatment control measures or Best Management Practices (BMPs) to be incorporated into the development to minimize pollutant load generation, reduce nuisance flows commonly associated with urban development, and to minimize the volume, velocity, and pollutant load of stormwater leaving the development site. Furthermore, the WQMP shall contain provisions for long-term operation and maintenance of approved permanent Best Management Practices (BMP), a monitoring program and a public education program to protect and improve water quality.
(County Policy 3.2.2.3)

6. All development, as defined in Section 30106 of the Coastal Act, approved within the Bolsa Chica LCP area shall be designed and undertaken in compliance with applicable provisions of the State National Pollution Discharge Elimination System (NPDES) General Permit for Stormwater Discharge Associated with Construction Activity issued by the State Water Resources Control Board (SWRCB), and any subsequent amendments or re-issuance of; the County's NPDES Municipal Stormwater Permit, issued to Orange County and Cities by the California Regional Water Quality Control Board, and any subsequent amendment to or re-issuance thereof; the Orange County Drainage Area Management Plan (OC DAMP); and the water quality and marine resource policies of the LCP. (NEW)

7. ~~All drainage facilities and erosion control measures at Bolsa Chica shall be designed and constructed to protect coastal/marine resources in accordance with the Orange County Flood Control District Design Manual and the Orange County Grading Code~~.

All drainage facilities, permanent structural Best Management Practices (BMPs), and erosion control measures within the Bolsa Chica LCP area shall be designed and constructed to protect coastal/marine resources consistent with the certified LCP and applicable management measures recommended in California's Plan for the Control of Non-Point Source Pollution (January 2000), and in accordance with the specifications contained in the California Stormwater Best Management Practice Handbooks (1993), or any re-issuance thereof, the Orange County Flood Control District Design Manual and the Orange County Grading Code.

a. Where drainage facilities/ BMPs, or erosion control measures are necessary to comply with applicable Federal State and local water quality or flood control regulations, such facilities shall be located outside of natural drainage courses, to the maximum extent feasible, as well as outside of environmentally sensitive habitat areas or buffers.

b. Additionally, if detention basins or retention facilities are used, they shall be designed to promote the infiltration of stormwater into the ground for groundwater recharge. (County *Policy 3.2.2.4)*

8. ~~Urban runoff from the Bolsa Chica LCP Area shall comply with all existing and applicable Federal, State, and local water quality laws and regulations~~.

Stormwater runoff and nuisance flow from development within the Bolsa Chica LCP area, shall not cause or contribute to significant adverse impacts in immediate receiving waters, or in waters to which immediate receiving waterways are tributary, such as bays, wetlands, and other coastal waters. *(County Policy 3.2.2.5)*

9. ***Where new storm drain outlets are necessary, discharge points shall be sited and designed to release in the least environmentally sensitive location and manner.***

a. Storm drains are prohibited from discharging directly into Outer Bolsa Bay, the Bolsa Chica Ecological Reserve, Warner Pond or the lowland wetlands restoration area.

b. The discharge (in terms of both volume and water quality) of stormwater into other wetlands or ESHAs other than those specified in subsection (a) above, shall only be allowed if necessary to maintain or enhance the functional capacity of the receiving wetland or ESHA.

c. energy dissipater devices shall be installed on all approved storm drain outlets to prevent erosion and scour at base. (NEW)

10. ~~Sediment basins (e.g., debris basins and/or silt traps) shall be installed in conjunction with all initial grading operations, and shall be maintained throughout the development/construction process to remove sediment from surface runoff.~~

An erosion and sediment control plan shall be prepared by an appropriate licensed professional, and submitted, prior to issuance of any coastal

development permit which includes grading and/or any construction, including construction of backbone infrastructure, within the LCP area. The plan shall include provisions for all of the following:

a. Sediment basins (e.g., debris basins and/or silt traps) and other erosion control measures (such as sandbags) shall be installed in conjunction with all initial grading operations to contain sediment on-site, and shall be maintained throughout their intended lifetimes to remove sediment from surface runoff.

b. Temporary and/or permanent erosion control measures shall be provided in order to control erosion both during and after project implementation. Sediment basins, debris basins, de-silting basins, or silt traps shall be designed and installed in accordance with the specifications contained in the California Stormwater Best Management Practice Handbook – Construction Manual (1993), and Chapter 2 of the Planned Community Program. *(County Policy 3.2.2.6)*

11. ***A Stormwater Pollution Prevention Plan (SWPPP) shall be prepared for the Bolsa Chica Planned Community development, by a registered civil engineer. The SWPPP shall be in compliance with the State Water Resources Control Board (SWRCB) General Construction Activity Stormwater NPDES Permit.*** ***(NEW)***

12. ***Dry weather (April 30th through October 1st of any year) nuisance flows shall be diverted to flow into the local wastewater treatment facility, or other suitable treatment/reclamation facility for treatment prior to discharge. (NEW)***

13. ***Natural drainage patterns in areas designated as Conservation or Open Space and Recreation shall be maintained, restored where feasible. (NEW)***

14. Final designs for dredging and excavation projects shall: a) include measures to protect water quality in adjacent areas during construction and maintenance activities; b) shall be consistent with Section 404 of the Federal Clean Water Act and Section 10 of the Federal Rivers and Harbors Act of 1899; and c) shall not adversely affect water quality or marine habitats. *(County Policy 3.2.2.7)*

15. Turbidity barriers shall be used during construction ***located within the vicinity of any tidal areas,*** ~~of Full Tidal Areas~~ to limit the impacts of turbidity on ocean waters. A barrier ~~may~~ ***shall*** be used~~, if feasible~~, in the vicinity of ~~the Tidal Inlet~~ ***any tidal inlet*** during its construction to limit turbidity in the sea. *(County Policy 3.2.2.8)*

16. ***Protection against the spillage of crude oil, gas, petroleum products, or hazardous substances shall be provided by the oil field operators in relation to any development or transportation of such materials. Effective containment and cleanup facilities and procedures shall be provided which minimizes the total volume of oil spilled and provides access to the most effective feasible containment and recovery equipment for oil spills.*** ***(NEW)***

~~Flood Control Policies~~

~~9. The EGGW Flood Control Channel shall be upgraded between Graham Street and the Full Tidal portion of Wetlands Ecosystem Area to provide combined extreme tide/100-year storm event protection to existing and future homes in the area~~. *(County Policy 3.2.2.9)*

~~10. The EGGW Flood Control Channel west of Planning Area 11 shall be removed in order to dilute contaminants and provide stormwaters for the Wetlands Ecosystem Area~~. *(County Policy 3.2.2.10)*

3.3.2 PHYSICAL RESOURCES POLICIES

1. Structures for human occupancy, ~~which are~~ ***including those*** located in areas of liquefiable soils, shall ~~conform with all design mitigations required by the County of Orange to~~ minimize risk to life and property ***and shall***~~. Where appropriate, mitigation should~~ include ***foundation designs and*** measures to increase the resistance of the underlying soils to liquefaction.
(County Policy 3.3.2.1)

2. In accordance with California's Alquist-Priolo Special Studies Zone Act, all development within Bolsa Chica shall be consistent with the site planning and engineering guidelines for the Earthquake Hazard Special Study Zones established for the Newport-Inglewood fault zone that traverses Bolsa Chica. *(County Policy 3.3.2.2)*

3. The risk to life and property from surface subsidence at Bolsa Chica shall be minimized by full compliance with oil extraction and monitoring techniques as regulated by the California Department of Mines and Geology.
(County Policy 3.3.2.3)

4. Surficial subsidence shall be monitored and groundwater re-pressurization or other methods shall be used to limit potential subsidence impacts.
(County Policy 3.3.2.4)

5. Where development areas adjoin bluffs, all buildings and habitable structures shall be set back a sufficient distance from the bluff edge to be structurally safe from the threat of bluff erosion for ~~a minimum of 50 years~~. ***for a minimum of seventy-five (75) years.*** Geotechnical engineering reports shall be required ~~by the County of Orange~~ ***from all applicants at the time an application for development adjoining a blufftop is submitted*** to determine ~~this~~ ***the adequacy of any proposed*** setback. *(County Policy 3.3.2.5)*

~~6. Development above the coastal bluff facing Outer Bolsa Bay shall be engineered to ensure that surface/subsurface drainage will not contribute to the erosion or affect the stability of the bluff. Any drainage pipes and outlets shall be installed by auguring (i.e., "drilled" from behind the slope face to exit at or near the base of the bluff) not open excavations or trenching, to ensure bluff stability and minimize visual impacts. Any minor residual affects related to drainage improvements shall be mitigated by recontouring and revegetating to obtain a natural landform appearance.~~
(County Policy 3.3.2.6)

6. The 25- to 60-foot-high northeast-facing bluff below the Huntington Mesa shall be preserved and restored as set forth in ***this Land Use Plan's Public Access and Visitor Serving Recreation Component*** ~~the County-adopted General Development Plan/Resource Management Plan for Harriett Wieder Regional Park. This shall include the ESHA restoration set forth in the Wetlands Restoration Program~~. Any areas requiring remedial grading or slope stabilization shall be recontoured and revegetated with native plant material to restore the natural landform appearance. *(County Policy 3.3.2.7)*

7. The coastal bluff facing Outer Bolsa Bay and the steep bluff below the Huntington Mesa shall both be protected from human intrusion. Where bluff-top trails are permitted, they will be set back from ***the*** edge of the bluff and planted and signed to discourage pedestrians from leaving the trails. *(County Policy 3.3.2.8)*

8. ~~Pursuant to the County-adopted Resource Management Plan for Harriett Wieder Regional Park, a 10- to~~ ***A*** 100-foot ESHA/wetlands buffer zone shall be designated the length of ~~the park~~ ***Harriet Wieder Regional Park*** and provide separation between the park's equestrian trail on the Mesa and ESHAs along the bluff and the Seasonal and Perennial Pond areas below. *(County Policy 3.3.2.9)*

9. ~~The historically degraded slope between Bolsa Chica Mesa and the Lowland Pocket Area, that extends from the southern corner of the Mesa to the EGGW Flood Control Channel, shall be remedially graded for stabilization of the Mesa development. The base of the slope shall be protected from Muted Tidal flows related to wetlands restoration. Public Class I bicycle and pedestrian trails shall be included in the design of the stabilized slope.~~

Development shall assure stability and structural integrity and neither create nor contribute significantly to erosion, geologic instability or destruction of the site or surrounding area. Development shall be sited and designed to minimize the alteration of natural landforms and shall not require the construction of protective devices that would substantially alter natural landforms. Where permitted to be altered pursuant to the Conservation Land Use designation the bluff will be restored to a natural appearance through landscaping consisting of native drought-tolerant vegetation. *(County Policy 3.3.2.10)*

3.4.2 CULTURAL RESOURCES POLICIES

1. ***Development within the*** ~~The~~ Bolsa Chica ~~Planned Community Program~~ ***LCP area*** shall ~~require compliance~~ ***comply*** with all ~~County-adopted~~ archaeological/paleontological policies and ***County*** Board of Supervisors Resolution No. 77-866 related to cultural and scientific resources, to ensure that all reasonable and proper steps are taken to either preserve archaeological remains in place, or alternatively, that measures are taken to assure the recovery, identification, and analysis of such resources so that their scientific and historical values are preserved. *(County Policy 3.4.2.1)*

2. ***In the event that any Native American human remains are uncovered; the County Coroner, the Native American Heritage Commission, and the Most Likely Descendants shall be notified.*** The recommendations of the Most Likely Descendants, as designated by the California Native American Heritage Commission, shall be obtained prior to the reburial of any prehistoric Native American human remains ~~that may be encountered during any archaeological investigation~~. *(County Policy 3.4.2.2)*

3. An archaeological research design ~~for Bolsa Chica~~ shall be ~~completed prior to approval of the first Coastal Development Permit for land use development~~ ***submitted along with any application for a coastal development permit for development within any planning area containing archaeological or paleontological resources*** ~~required by the Planned Community Program~~. The research design shall:

   a. contain a discussion of important research topics that can be addressed employing data from the Bolsa Chica sites; and
   b. be reviewed by at least three (3) County-certified archaeologists ***(peer review committee)***, ~~as required by the guidelines of the California Coastal Commission~~.

c. ***The research design shall be reviewed by the State Office of Historic Preservation and the Native American Heritage Commission.***

d. ***The research design shall be developed in consultation with affected Native American groups.***

e. ***The peer review committee shall assure the implementation of mitigation measures consistent with the archeological research design.*** *(County Policy 3.4.2.3)*

4. A systematic cultural resources survey ~~of the Lowland~~ ***of any planning area*** shall be initiated ***and completed before an application is submitted for any coastal development permit affecting that planning area*** to determine if there are any cultural deposits, and if so, to evaluate their significance. ***The determination of significance shall be based on the requirements of the California Register of Historical Resources criteria.*** If found to be significant, the site(s) shall be tested and preserved in open space~~, if feasible~~; or, if preservation cannot be accomplished consistent with the LUP, a data recovery plan shall be implemented in coordination with ~~the phasing of wetlands restoration and/or~~ development activities. *(County Policy 3.4.2.4)*

5. A County-certified ~~paleontological field observer, working under the direction of a County-certified~~ paleontologist***/archeologist***, shall monitor all grading operations on the Bolsa Chica Mesa and Huntington Mesa. ***Grading operations shall also be monitored by a Native American monitor.*** If grading operations uncover ~~significant~~ paleontological***/archeological*** resources, the ~~field observer~~ ***paleontologist/archeologist or Native American monitor*** shall ~~divert equipment~~ ***suspend all development activity*** to avoid destruction of ~~significant~~ resources ***until a determination can be made as to the significance of the paleontological/archeological resources. If found to be significant, the site(s) shall be tested and preserved until a recovery plan is completed to assure the protection of the paleontological/archeological resources***. *(County Policy 3.4.2.5)*

3.5.2 VISUAL AND SCENIC RESOURCES POLICIES

1. ~~Existing views of the coast from public areas shall be preserved.~~

The scenic and visual qualities of coastal areas shall be considered and protected as a resource of public importance. Permitted development shall be sited and designed to protect public views to and along the ocean and scenic coastal areas, to minimize the alteration of natural landforms, to be visually compatible with the character of surrounding areas, and, where feasible, to restore and enhance visual quality in visually degraded areas.

New development in highly scenic areas shall be subordinate to the character of its setting. *(County Policy 3.5.2.1)*

~~2. The Wetlands Restoration Program shall be implemented to improve the visual and scenic character of Bolsa Chica. In particular, the contouring of tidal areas, the creation of dunes, and the planting of approved wetlands and ESHA vegetation shall be done to minimize the artificial "engineered" geometry associated with oil roads and drilling operations, as well as flood control channels, dams, and dikes. Final design and planting shall emphasize the restoration of the meandering and curvilinear patterns historically associated with natural processes and the Bolsa Chica wetlands prior to urbanization.~~ *(County Policy 3.5.2.2)*

~~3. As determined compatible with the Wetlands Restoration Program, public access to the Wetlands Ecosystem Area shall be improved and managed so as to provide a "close-up" visual experience for the public.~~
(County Policy 3.5.2.3)

2. ***Public*** ~~To the extent feasible, continuous public~~ viewing opportunities shall be provided from all trails within Bolsa Chica, including:

   a. ~~The~~ ***A*** Class I Trail within the Buffer ***separating the residential development on the upper portion of the Mesa from the areas designated as Conservation shall be provided within the buffer area as depicted in Figure 2.1-1. This trail shall be located within the twenty-five feet nearest the residential development.*** ~~which separates the Muted Tidal wetlands from the Bolsa Chica Mesa development;~~

   ~~b. The Class I Trail along the EGGW Flood Control Channel; and~~

   ~~c. The Class I Trail along the flood control berm that separates the most inland Muted Tidal wetlands from the Lowland development, and along the boardwalk that connects Harriett Wieder Regional Park with the Lowland.~~
   (County Policy 3.5.2.4)

3. Viewing opportunities shall be provided from trails within Harriett Wieder Regional Park, including interpretive trails and the equestrian trail that connects (off-site) with Huntington Central Park. *(County Policy 3.5.2.5)*

4. New public viewpoints shall be established within the following new public parks:

   a. Three (3) viewpoints within Harriett Wieder Regional Park; ***and***

   b. At least one (1) viewpoint within ~~Mesa Community Park~~ ***the buffer area*** on the Bolsa Chica Mesa ***as depicted in Figure 2.1-1***.~~; and~~

~~c. At least one (1) viewpoint within Lowland Community Park.~~
(County Policy 3.5.2.6)

5. The existing State Ecological Reserve overlook and exhibit area at the southerly corner of the Bolsa Chica Mesa shall be replaced with a new facility designed in consultation with the ***California Department of Fish and Game***~~,~~ ***and the*** State Coastal Conservancy ~~and the Amigos de Bolsa Chica~~. *(County Policy 3.5.2.7)*

6. The two (2) existing State Ecological Reserve parking areas and scenic overlooks (one along Pacific Coast Highway across from the State Beach and the other near the intersection of Pacific Coast Highway and Warner Avenue) shall be improved in consultation with the ***California Department of Fish and Game***~~,~~ ***and the*** State Coastal Conservancy ~~and the Amigos de Bolsa Chica~~. *(County Policy 3.5.2.8)*

7. To create a visually cohesive backdrop for the Wetlands Ecosystem Area, landscaping within development areas of Bolsa Chica shall predominantly utilize trees used in the regional and local parks~~, and in the Buffers~~. ***Landscaping in the Conservation, Open Space and Recreation, and buffer areas shall consist exclusively of native drought tolerant plants unless otherwise recommended by the California Department of Fish and Game or the U.S. Fish and Wildlife Service.*** *(County Policy 3.5.2.9)*

8. Plant material within ***any buffer area*** ~~and~~/or adjacent to the ~~100-foot-wide Buffer between development and the~~ Wetlands Ecosystem Area shall provide significant visual softening of architectural facades and building mass when viewed from public areas. *(County Policy 3.5.2.10)*

9. Buffer areas between wetlands/ESHA habitats and development/recreation areas shall provide for a gradual transition in landscape materials to avoid visually abrupt edges and an artificial appearance. *(County Policy 3.5.2.11)*

10. The planting of trees within development areas and Harriett Wieder Regional Park shall utilize informal patterns and drifts which provide a visually soft and natural backdrop for the Wetlands Ecosystem Area - creating a sense of visual enclosure to the wetlands and shielding the Wetlands Ecosystem Area from oil operations and urban development.
(County Policy 3.5.2.12)

~~13. The planting of trees within Harriett Wieder Regional Park shall be consistent with provisions of the County-adopted General Development Plan (i.e., the Landscape Character Plan which defines tree plantings of appropriate heights and densities) and Resource Management Plan (i.e., the Visual Resources Section), in particular~~

~~to protect views from existing and planned adjacent residences toward the Wetlands Ecosystem Area and Pacific Ocean, and to ensure a landscape maintenance program which utilizes tree trimming to maintain views.~~ *(County Policy 3.5.2.13)*

11. The Planned Community Program shall limit and regulate signage within all Recreation, Public Facility, and Conservation Planning Areas so that it is only a minor visual element essential for public safety, ~~welfare, and convenience~~, ***resource protection, and to inform the public of the availability of the public recreational amenities***. Signage shall be of a consistent coastal theme. *(County Policy 3.5.2.14)*

11. Utilities for all new development shall be placed underground, ~~unless impractical or undesirable~~ ***to the maximum extent feasible*** from a comprehensive environmental perspective. *(County Policy 3.5.2.15)*

13. Existing above-ground utilities and oil equipment shall be removed from Bolsa Chica ***to the maximum extent feasible*** ~~wherever and whenever possible~~, without interfering with the oil operations. *(County Policy 3.5.2.16)*

14. Residential building heights shall be limited to ~~two (2)~~ ***three (3)*** stories (45 feet maximum) ~~along the bluff facing Outer Bolsa Bay~~ to reduce the visual appearance of development ~~from Pacific Coast Highway~~.
(County Policy 3.5.2.17)

~~18. Building heights shall be limited to two (2) stories (35 feet maximum) along Los Patos Avenue to reduce the visual appearance of new development from existing development on the north side of Los Patos.~~ *(County Policy 3.5.2.18)*

~~19. Building heights and setbacks within the Northeast Lowland shall be regulated along the edge between new development and existing development so as to reduce the visual impact of new units on existing units~~. *(County Policy 3.5.2.19)*

15. All fences shall be ***sited and*** designed to ***protect*** ~~be functional and to have a minimum impact on~~ coastal and scenic views ***and to be visually compatible with the character of surrounding areas*** ~~from public locations~~. This includes privacy fencing for residential areas, as well as environmental-control fencing used within the Wetlands Ecosystem Area for species protection.
(County Policy 3.5.2.20)

C. PUBLIC ACCESS/VISITOR SERVING RECREATION COMPONENT

CHAPTER 4 OF THE LAND USE PLAN AMENDMENT

4.2 PUBLIC ACCESS AND VISITOR SERVING RECREATION POLICIES

Graphic Suggested Modification: Figures 4.3-1 and 4.3-2 and Tables 4-1 and 4-2 of the submitted LCP illustrate the public access and visitor serving recreation components contained in the Bolsa Chica Local Coastal Program of December 14, 1994 shall be modified as follows. The trails and public facilities shown in the lowlands shall be deleted. The trails and public facilities shown for Harriet Wieder Park, the State Ecological Reserve, along Pacific Coast Highway, and Planning Area 3C shall remain as depicted in the original submittal. In terms of the Bolsa Chica Mesa, these graphics shall be modified to conform to **Figure 1** (on page 5) of this staff report. Any other figure depicting the Coastal Access and Recreation Plan shall also be modified. Since this policy refers to a graphic revision, once the graphic revisions are made, this policy does not need to be included in the amended Land Use Plan.

COMPREHENSIVE POLICIES

1. ***The recreational needs of new residents shall not overload nearby coastal recreation areas.*** Public coastal access, ***and recreational opportunities,*** including opportunities for wetlands observation and passive recreation such as picnicking, shall be established ***by the private landowner/master developer prior to issuance of any coastal development permit authorizing residential construction other than grading.*** ~~within new recreation and visitor-serving facilities~~. ***Recreational facilities and uses shall be located and designed in such a manner that there will be no significant adverse impacts to wetlands or ESHA resources.*** *(County Policy 4.2.1)*

2. All visitor-serving interpretive facilities shall be designed to be compatible with wildlife habitats. Public trails and interpretive programs shall be designed to ensure they do not adversely affect the Wetlands Ecosystem Area***, any Mesa wetlands, the Eucalyptus Grove ESHAs, Tarplant areas or any of the wetlands located between the EGGW Channel and the Mesa***. *(County Policy 4.2.2)*

3. ***Adequate public parking shall be distributed throughout the Bolsa Chica LCP area in a manner which encourages public use of the various recreational facilities. (NEW)***

4. ***Lower cost visitor and recreational facilities shall be protected, encouraged, and where feasible, provided. Developments providing public recreational opportunities are preferred. (NEW)***

5. ***A comprehensive signage program for all public access/visitor serving recreation facilities shall be provided and shall inform the public of the availability of, and provide direction to, the on-site recreation amenities of the Bolsa Chica LCP area.*** **(NEW)**

6. ***Development shall not interfere with the public's right of access to the sea where acquired through use or legislative authorization, including, but not limited to, the use of dry sand and rocky coastal beaches to the first line of terrestrial vegetation.***

TRAILS POLICIES

7. ***The public trail system shall be consistent with Figure 4.3-2 of the Land Use Plan which depicts the public trail system. Public trails within the buffer separating the upper and lower Mesa benches and along the portion of the upper Mesa overlooking the lowland shall be located within the twenty-five (25) feet nearest the urban development.*** **(NEW)**

8. A comprehensive network of bicycle and pedestrian trails shall be provided for public access. This network shall link Huntington Central Park, Harriett Wieder Regional Park, Bolsa Chica Wetlands Ecosystem Area, Bolsa Chica State Beach, ~~and~~ Bolsa Chica State Ecological Reserve***, and the Bolsa Chica Mesa bluff trail*** to surrounding residential, recreation, and public parking areas. ~~It shall include an elevated boardwalk (i.e., Lowland Trail Corridor) through the Seasonal Ponds, connecting Harriett Wieder Regional Park with the Northeast Lowland~~. *(County Policy 4.2.3)*

9. Opportunities for wetlands observation shall be provided by overlooks provided along public trails in Buffers between the residential areas and the ***Wetlands*** ~~restored wetlands~~ ***Ecosystem Area***. Consistent with ~~Policies 8 and 9 of~~ the Wetlands/Biological Resources Component, limited access interpretive trails shall be provided along ***portions of the Bolsa Chica Mesa and*** berms within the Wetlands Ecosystem Area ***as shown in Figure 4.3-2***. Public use of such trails shall be controlled to protect wildlife and habitat values. ***Public use trails other than interpretive trails shall not be limited.*** (*County Policy 4.2.4)*

10. All bikeways shall be consistent with the Orange County Master Plan of Regional Bikeways, and the ***City of*** Huntington Beach Master Plan of Local Bikeways. *(County Policy 4.2.5)*

11. The Landowner/Master Developer shall***, prior to issuance of any coastal development permit approving any subdivision of a Bolsa Chica LCP area, irrevocably*** dedicate to the County of Orange or other public agency, the land and/or easements within the Bolsa Chica LCP Area that are ***owned by the private landowner/master developer that are*** required for public trails indicated on the Coastal Access and Recreation Plan ***(Figure 4.3-2)***. *(County Policy 4.2.6)*

12. ***All new trails shown on the Coastal Access and Recreation Plan (Figure 4.3-2) that are required to be irrevocably dedicated to the County or other public agency prior to the issuance of any coastal development permit approving any subdivision of the Bolsa Chica LCP area under the ownership of the Landowner/Master Developer shall be graded by the***

private Landowner/Master Developer at the time grading for the roadways for the planning area occurs. All such trails shall be improved by the private Landowner/Master Developer concurrent with the construction of the roadways and prior to the issuance of any coastal development permit authorizing residential construction (except grading). (NEW)

PUBLIC PARKING AND STAGING AREA POLICIES

13. The Harriett Wieder Regional Park, local parks, and other visitor-serving recreation facilities shall include ~~appropriate~~ ***adequate*** on- and off-street public parking and bicycle racks. *(County Policy 4.2.7)*

~~8. Approximately100 public parking spaces shall be provided within the Mesa Community Park, and in parking pockets along the Bolsa Chica Mesa Connector adjacent to the park to accommodate the parking needs of residents and visitors to Bolsa Chica's recreational and interpretive facilities~~. *(County Policy 4.2.8)*

~~9. Approximately 60 public parking spaces shall be provided within and adjacent to the Lowland Community Park to accommodate visitors to park facilities and Lowland trails~~. *(County Policy 4.2.9)*

14. ***A public vehicular bluff edge scenic road shall be provided on the Bolsa Chica Mesa immediately landward of the buffer as required below. The purpose of the bluff edge scenic road is to maximize public access to the public buffer trail, separate private residential land use from public use areas, to preserve scenic views of the lowland and the ocean, and allow for public safety and emergency vehicle access to the public areas. Parallel public parking shall be provided along both sides of the bluff edge scenic road, and no red curbing or signs shall be permitted or any other structure of practice allowed to prohibit public parking except near street intersections where necessary for public safety reasons.*** **(NEW)**

15. ***Private roads which limit the public's ability to park within any residential areas shall not be allowed unless a public parking lot containing a minimum of thirty (30) parking spaces is provided adjacent to the public scenic roadway. Public roads will provide public on-street parking.*** **(NEW)**

HARRIETT WIEDER REGIONAL PARK POLICIES

16. ~~The~~ ***Prior to issuance of any coastal development permit for residential subdivision of the Bolsa Chica Mesa the*** approximately 49 acres of land owned by the Landowner/Master Developer on the Huntington Mesa, shall be irrevocably dedicated to the County of Orange for ***public park purposes and*** inclusion within the proposed 106-acre Harriett Wieder Regional Park ~~upon final certification of the LCP~~. *(County Policy 4.2.10)*

17. Harriett Wieder Regional Park~~, as described in the County-approved General Development Plan and Resource Management Plan,~~ shall provide a variety of interpretive and recreational opportunities for the public. Interpretive areas which emphasize the ecology and history of Bolsa Chica shall be the focal point of Regional Park facilities. *(County Policy 4.2.11)*

18. Visitor-serving concessions permitted within the Harriett Wieder Regional Park shall be located, designed and operated so as not to create unmitigable traffic congestion or vehicular/pedestrian hazards. *(County Policy 4.2.12)*

19. ~~The Harriett Wieder (formerly Bolsa Chica) Regional Park General Development Plan and Resource Management Plan is incorporated by reference in the LCP, and may be updated by the County of Orange consistent with the Bolsa Chica LUP policies~~. ***Harriett Wieder (formerly Bolsa Chica) Regional Park shall be devoted to open space/park use. Development shall minimize the alteration of land forms, landscaped in a manner compatible with the adjacent wetlands and environmentally sensitive habitat areas, and provide adequate off-street public parking. Any General Development Plan and Resource Management Plan prepared for the regional park shall be in conformance with the land resources protection policies (wetland and ESHA resources, archaeological resources, landform alteration) and the public access (public parking) policies of the Coastal Act. The General Development Plan and Resource Management Plan may be incorporated into the LCP only through an LCP amendment certified by the Coastal Commission.*** *(County Policy 4.2.13)*

~~INTERPRETIVE KAYAK/CANOE FACILITY POLICIES~~

~~14. A small boat dock, small quiet water swimming beach, and related facilities shall be provided at an appropriate location within the Recreation and/or Conservation Planning Areas of the Bolsa Chica Planned Community to facilitate a ranger-managed interpretive kayak/canoe program of the wetlands for the general public.~~

~~Interpretive kayaks/canoes shall be restricted to the Full Tidal Area under the jurisdiction of Orange County or other managing agency.~~ *(County Policy 4.2.14)*

~~15. The Bolsa Chica Planned Community Program, Recreation and Conservation Planning Areas shall permit facilities for small non-motorized boats (kayaks and/or canoes), and facilities for boats and dredges necessary to operate and maintain the Wetlands Ecosystem Area. Permitted ancillary uses shall accommodate dry storage for kayaks and/or canoes, a launching ramp, and other necessary related facilities (e.g., hoists, stacking, and staging areas) to provide safe public access to, and use, of coastal waters.~~
(County Policy 4.2.15)

~~16. The interpretive kayak/canoe facility shall be designed and operated so as to be compatible with wildlife habitats and water quality objectives established in this LUP. Public programs shall be designed to ensure that wetlands interpretation does not adversely affect the Wetlands Ecosystem Area.~~ *(County Policy 4.2.16)*

BOLSA CHICA STATE BEACH POLICIES

20. All recreation and circulation planning for ~~the Tidal Inlet~~ ***any proposed tidal inlet*** area of Bolsa Chica State Beach shall be done in coordination with the California Department of Parks and Recreation***, the California Department of Transportation, and the City of Huntington Beach. Any proposed tidal inlet shall require approval from the California Coastal Commission and shall be consistent with the Chapter 3 policies of the Coastal Act.***
(County Policy 4.2.17)

~~22. Only the portion of Bolsa Chica State Beach affected by the Tidal Inlet is addressed by this LCP~~. The California Department of Parks and Recreation may prepare a separate "Public Works Plan" (or other LUP/IAP documentation) for any and all portions of Bolsa Chica State Beach~~, and this State plan may be certified by the Coastal Commission without amending this LCP~~. *(County Policy 4.2.18)*

LOCAL PUBLIC PARKS POLICIES

~~21. The Landowner/Master Developer shall prepare a Local Park Implementation Plan (LPIP) so as to fully satisfy the County's Local Park Code.~~
(County Policy 4.2.19)

~~22. All local public parks required by the LPIP shall be irrevocably offered for dedication to the County of Orange as a condition of subdivision approvals, in accordance with the County's Local Park Code.~~ *(County Policy 4.2.20)*

21. ***A signage plan shall be prepared to direct the public to the recreational amenities. Signage visible from Warner Avenue, Los Patos, Edwards Street, and Seapoint shall be provided to direct the public to the recreational amenities. (NEW)***

D. REGIONAL CIRCULATION AND TRANSPORTATION COMPONENT

CHAPTER 5 OF THE LAND USE PLAN AMENDMENT

5.2 REGIONAL CIRCULATION/TRANSPORTATION POLICIES

REGIONAL CIRCULATION POLICIES

1. ~~An~~ ***Any*** Area Traffic Improvement Program (ATIP) ***that is prepared by the landowner/master developer*** shall ~~be created and~~ include the following elements:

   a. regional road improvements that enhance coastal access;

   b. improvements to Bolsa Chica Street, Warner Avenue, and Pacific Coast Highway which are the primary travel corridors serving the LCP Area;

   c. provision ~~of~~ ***for*** funding ~~for~~ ***of*** traffic improvements; and

   d. a traffic improvement phasing plan which ensures that road improvements are phased in conjunction with residential ***and commercial*** development.

   e. The ATIP shall be in conformance with the policies of the Coastal Act. The ATIP may be incorporated into the LCP only through an LCP amendment certified by the Commission. *(County Policy 5.2.1)*

ARTERIAL HIGHWAY POLICIES

~~2. The ATIP shall provide improvements at the interchange of the 405 Freeway and Warner Avenue.~~ *(County Policy 5.2.2)*

2. The ~~ATIP~~ ***landowner/master developer*** shall provide improvements at the interchange of the 405 and 22 Freeways with Bolsa Chica Street ***prior to issuance of any coastal development permit authorizing residential construction other than grading***. *(County Policy 5.2.3)*

3. An offer of dedication shall be made by the private landowner to achieve the ultimate Major Arterial width of Pacific Coast Highway within the Bolsa Chica LCP Area (i.e., to a 120-foot right-of-way). This shall entail a 15-foot-wide offer of dedication within the "Whipstock" (oil facilities) Area adjacent to Pacific Coast Highway. All other lands required for the potential Pacific Coast Highway widening are owned by either the State of California or the City of Huntington Beach, including parts of Bolsa Chica State Beach and the Bolsa Chica State Ecological Reserve. *(County Policy 5.2.4)*

~~5. An offer of dedication shall be made by the private landowner to achieve the ultimate Major Arterial width for Warner Avenue. This dedication shall include a 30-foot-wide offer of dedication on the Bolsa Chica Mesa adjacent to Warner Avenue.~~ *(County Policy 5.2.5)*

4. The Warner Avenue/Pacific Coast Highway intersection shall be improved to facilitate circulation to and from Bolsa Chica State Beach. *(County Policy 5.2.6)*

~~ATIP FINANCING POLICIES~~

7. ~~An ATIP funding program for those ATIP phases included within a subdivision shall be established at the time of tentative map approval. The funding program shall be satisfactory to the Director/EMA.~~
(County Policy 5.2.7)

8. ~~Security for all "Full Construction" ATIP improvements within an ATIP phase shall be provided before the issuance of the first building permit for a residential unit within that phase. Security may consist of a bond, letter of credit, or establishment of a funding mechanism such as an assessment district or community facilities district.~~
(County Policy 5.2.8)

~~9. If not included within a financing district, a fee program to fund the "Fair-Share Participation" ATIP improvements within an ATIP phase shall be established at the time of the approval of the first tentative tract map including units within that ATIP~~

~~phase. Fees for residential units within an ATIP phase shall be made before recordation of the final map which includes the residential unit~~. *(County Policy 5.2.9)*

~~10. An advisory committee will be established to monitor the implementation of ATIP. The County of Orange will be the lead agency and committee members will include representatives of the cities of Huntington Beach, Fountain Valley, and Westminster along with representatives from the Orange County Transportation Authority (OCTA) and the Landowner/Master Developer. Non-participation or lack of cooperation by public agency members in implementing ATIP improvements shall not result in the County withholding development approvals~~. *(County Policy 5.2.10)*

ATIP PHASING POLICIES

~~5. ATIP shall be phased as described in Table 5.1~~. A detailed phasing plan shall be submitted to the Director of ~~EMA~~ ***PDSD at the time of submittal of any coastal development permit application for the approval any subdivision*** ~~prior to recordation of a final map for residential development~~. Detailed phasing plans shall be developed in accordance with the County Growth Management Plan and the Congestion Management Plan, ~~and~~ identify the specific improvements necessary to accommodate new development and provide a schedule for completing the improvements***, and be consistent with the improvements as described in Table 5-1 of the Land Use Plan. The improvements necessary to accommodate the residential development shall be constructed prior to the issuance of the coastal development permit authorizing the residential development.***
(County Policy 5.2.11)

LOCAL CIRCULATION POLICIES

6. Impacts to surrounding neighborhoods shall be minimized by providing access routes to the Bolsa Chica Mesa development area on arterial roads including Warner Avenue and Bolsa Chica Street. *(County Policy 5.2.12)*

~~13. Lowland residential access shall be provided on three arterials to minimize traffic impacts on any one arterial access. Graham Street and Talbert Avenue will be connected by a Secondary (four lanes undivided) road to provide appropriate accessibility to both streets~~. *(County Policy 5.2.13)*

7. Non-auto circulation shall be provided within the Planned Community**,** including Class I and Class II bicycle, equestrian, and hiking trails linking community parks,

Bolsa Chica State Beach, and ~~the~~ Harriett Wieder Regional Park. Pedestrian connections from residential subdivisions to these trails shall be provided. Surrounding communities shall also have access to these trails to facilitate non-vehicular access to local and regional recreational opportunities. ***Safe and secure bicycle racks shall be provided at appropriate locations within the community and regional parks, and along the trails on the Bolsa Chica Mesa***. (County *Policy 5.2.14)*

TRANSIT POLICIES

8. The arterial highway facilities implemented as part of the Planned Community shall include provisions for bus turnouts at appropriate locations. *(County Policy 5.2.15)*

9. Pedestrian linkages from adjacent residential uses shall be furnished to accommodate access to the bus transit systems. *(County Policy 5.2.16)*

AIR QUALITY POLICIES

10. Project-level Coastal Development Permits shall, where feasible, incorporate vehicular trip reduction strategies including the following:

a. Education and Information: A centrally-located commuter information area that offers information on available transportation alternatives, route schedules and maps, available employee incentives, and rideshare promotional material shall be provided in a community clubhouse ~~and/or Neighborhood Commercial areas~~.

b. Telecommunications: A telecommunications center shall be established within the Planned Community. This center could be located within a community clubhouse ~~or Neighborhood Commercial area~~, and include Automatic Teller Machines, Modem/Fax stations, Teleservice facilities, government information and/or transaction machines, and other related communication facilities which reduce the necessity of travel outside the Planned Community.

c. Bicycle Parking: Bicycle commuting shall be encouraged through the inclusion of amenities that address unique aspects of the bicycle commuter, including Class I and Class II Bicycle Trails and the provision of safe and secure bicycle racks ~~within the Neighborhood Commercial and~~ ***along the trails and within the*** community **and regional** park areas of ***the*** Bolsa Chica ***LCP area***. *(County Policy 5.2.17)*

E. DEVELOPMENT COMPONENT
CHAPTER 6 OF THE LAND USE PLAN AMENDMENT

6.2 DEVELOPMENT POLICIES

Residential Policies

1. A maximum of ~~3,300~~ ***1,235*** dwelling units shall be permitted within the ***portions of the*** Bolsa Chica Planned Community ***designated for residential development***. ~~The number of dwelling units for the Bolsa Chica Mesa shall not exceed 2,500. The number of dwelling units permitted for the Northeast Lowland (Planning Areas 10 and 11) shall not exceed 900.~~
(County Policy 6.2.1)

2. A wide range of residential densities and housing types shall be permitted on the Bolsa Chica Mesa. ~~A comparatively narrow range of Low-Density housing types shall be permitted in the Northeast Lowland. Although individual projects may vary, overall Planning Area densities shall not exceed the County General Plan's "Suburban" Residential Neighborhoods category (i.e., 0.5 to 18.0 DU/Ac.).~~ ***In no case will the residential density conflict with the "Planned Community Statistical Table" contained in the Planned Community Program.*** *(County Policy 6.2.2)*

3. ~~Residential development adjacent to the Wetlands Ecosystem Area shall be designed to avoid adverse impacts on habitat resources.~~

   Residential development shall be designed to avoid significant adverse impacts on wetlands or environmentally sensitive habitat resources. Residential development shall be distributed throughout the upper bench of the Bolsa Chica Mesa consistent with the Planned Community Statistical Table and shall not exceed a total of 1,235 residential units. All coastal development permits for the Bolsa Chica Mesa shall conform with the allocation of maximum dwelling units contained in the LCP's Planned Community Statistical Table both by Planning Area and in terms of the overall limit of 1,235 residential units. Development Areas created pursuant to any coastal development permit, as well as subsequent subdivision(s) of those Development Areas, shall not result in the creation of residential lots or parcels which do not have residential units associated with their future development. The intent of this policy is to ensure that no circumstance is created wherein the development of the Bolsa Chica Mesa would ever exceed the aforementioned 1,235 maximum residential units.

This residential cap on the total number of units on the Bolsa Chica Mesa applies to and includes all current and subsequent ownerships on the Mesa, and any development rights that may accrue from the Edwards Thumb parcel. (*County Policy 6.2.3)*

4. Street lights and other lamps over twelve (12) feet high in development areas shall be shielded to reduce the amount of light straying into the Wetlands Ecosystem Area. *(County Policy 6.2.4)*

~~5. Neighborhood Commercial facilities shall be permitted within specified Medium-High Density Residential Planning Areas, up to a maximum of 10 acres, consistent with the Orange County General Plan. Any such facilities shall be regulated by the Planned Community Program, and shall be evaluated using the "Guidelines; Neighborhood Commercial," set forth in the County General Plan. Neighborhood Commercial facilities shall not be permitted within the Low Density Residential Planning Areas in the Lowland~~. *(County Policy 6.2.5)*

5. New residential development shall be compatible in terms of neighborhood character and scale with existing adjacent residential development in the City of Huntington Beach. *(County Policy 6.2.6)*

LOCAL PARK AND COMMUNITY FACILITY POLICIES

6. Community parks shall serve the recreational needs of ***the general public as well as*** local residents~~, and shall also supply~~ ***to provide*** public coastal access ***opportunities*** ~~and staging areas~~ for visitors to Bolsa Chica ~~where appropriate~~. *(County Policy 6.2.7)*

7. Public schools shall be permitted within residential planning areas. *(County Policy 6.2.8)*

8. ***A ten (10) acre school site shall be designated immediately adjacent to Warner Avenue and on the lower bench of the Bolsa Chica Mesa as depicted in Figure 2.1-2. Any school constructed shall be designed to protect the adjacent Conservation area to the maximum extent feasible. Design features which shall be used to protect the adjacent Conservation area shall include, but not be limited to, the following:***

   a. The portion of the ten acre school site immediately adjacent to the conservation area shall be kept in open space to the maximum extent feasible, by for example, locating ballparks and other open space uses on the perimeter of the site closest to the conservation area.

b. The buffer between the school site and Warner Pond shall vary between 100 ft. and 100 m as depicted on Figure ____.

c. The entire school site shall be surrounded by fencing that precludes access to the surrounding conservation areas. The fencing shall be a minimum of seven (7) feet in height except where it is within 50 feet of the Warner Avenue access, and shall be constructed of solid block material which will minimize noise and create a visual shield between conservation areas and the school site. Within 50 feet of the Warner Avenue access, the fence may be stepped down to improve visual qualities and provide safe lines of sight for motorists. However, Warner Pond shall be shielded to the maximum extent feasible. Where necessary, chain link or other supplemental fencing materials may be used to prevent access to the conservation area. Native trees and shrubs shall be planted on both sides of the entire perimeter of the fence to reduce visual impacts and provide habitat. The specific design and plant pallet shall be determined in cooperation with the California Department Fish and Game and U.S. Fish and Wildlife Service.

d. Drainage for the school site shall not enter the conservation area.

e. No night lighting shall be utilized except for lighting that is necessary for safety and/or security purposes. Such lighting shall be low intensity and positioned downward. Playing fields shall not be lighted.

(NEW)

LOCAL ROAD AND INFRASTRUCTURE POLICIES

~~9. The local road system for the Bolsa Chica Mesa shall include a Secondary Arterial Highway that connects Bolsa Chica Street with Warner Avenue. This road shall be the primary spine for the community, and include notched parking and a landscaped median~~. *(County Policy 6.2.9)*

~~10. The existing three Arterial Highways that dead-end along the edge of Bolsa Chica's Northeast Lowland, shall all be extended into the LCP Area as Secondary Arterials. The ends of Graham Street and Talbert Avenue shall be connected by a Lowland Connector, which shall also be a Secondary Arterial with a median.~~ *(County Policy 6.2.10)*

~~11. An emergency access route for police, fire, and paramedic vehicles, shall be provided across the EGGW Flood Control Channel, that links the Northeast Lowland with the Bolsa Chica Mesa. This emergency access shall accommodate a Class I Bicycle/Pedestrian Trail. However, it shall be designed so that the~~

~~general public cannot use the emergency access or trail as a vehicular "cut through" route between the Bolsa Chica Mesa and the Lowland~~. *(County Policy 6.2.11)*

9. Water supply for development and fire protection shall be established in cooperation with an existing water agency or through the creation of a new agency. *(County Policy 6.2.12)*

10. Domestic and landscape water conservation devices shall be required in all new development, pursuant to State and County laws and guidelines. *(County Policy 6.2.13)*

11. Reclaimed water shall be used for public parkways and common area landscape irrigation within Bolsa Chica if the Orange County Water District and the Landowner/Master Developer reach agreement that it is economically feasible to provide reclaimed water through OCWD's Green Acres Project. *(County Policy 6.2.14)*

12. Consistent with sound civil engineering practices, utilities shall be principally located in road rights-of-way or, where necessary and feasible, in recreation and open space areas not primarily required for wildlife habitat. ***Any utilities located within recreation or open space areas shall be placed below grade where feasible. Where undergrounding is infeasible, utilities shall be designed in a manner which will not reduce useable recreation or parking area or be visually intrusive.*** New utilities shall not be located within ***ESHA, wetlands, or*** the Wetlands Ecosystem Area ~~unless~~ ***except to the extent the location of the utilities within a wetland constitutes an incidental public service and, in accordance with Coastal Act Section 30233(a)(5),*** there are no other feasible, less environmentally damaging alternatives as defined in the Coastal Act. Mitigation measures shall be provided to minimize adverse environmental effects of any new utilities located in this area. *(County Policy 6.2.15)*

13. New utilities to serve ***residential*** development shall be located ***within the residential development planning areas or existing road right-of-ways and*** outside of the Wetlands Ecosystem Area ~~unless~~ ***except to the extent the location of the utilities in the Wetlands Ecosystem Areas constitutes an incidental public service that is in accordance with Coastal Act Section 30233(a)(5) and*** there are no other feasible, less environmentally damaging alternatives as defined in the Coastal Act. Mitigation measures shall be provided to minimize adverse environmental effects of any new utilities located in these areas, including utilities directly related to petroleum production, wetlands

restoration and maintenance, and water quality and flood control. *(County Policy 6.2.16)*

~~17. A local roadway system in the Northeast Lowland shall link Graham Street, Talbert Avenue, and Springdale Street.~~ *(County Policy 6.2.17)*

COMMUNITY DESIGN POLICIES

14. The architecture of the Bolsa Chica community shall draw upon thematic characteristics found in traditional New England coastal towns, and adapt those characteristics to local conditions of climate, market, materials availability, density, and technology. *(County Policy 6.2.18)*

15. Community Transition/Urban Edge Treatment Plans shall be included as part of ***any coastal development permit application for development abutting a Conservation Planning Area*** ~~Coastal Development Permits required by the Planned Community Program~~, to illustrate the landscape edges, transitions, and interfaces between Bolsa Chica and existing residential neighborhoods in the City of Huntington Beach~~, as well as the 100-foot-wide Buffer between development and the various hydrologic regimes within the Wetlands Ecosystem Area~~. *(County Policy 6.2.19)*

~~20. The landscape transition between the habitat landscape of the restored wetlands/ ESHAs and the development shall be provided primarily by using native and low-maintenance plantings within the Buffer that adjoins each residential development area.~~ *(County Policy 6.2.20)*

16. Landscape screening (including low walls, shrubs, and/or drifts and groves of trees) shall be designed and installed along streets, trails, and the perimeters of residential and recreational developments to soften development edges visible from PCH and other public areas of Bolsa Chica. *(County Policy 6.2.21)*

F. OIL PRODUCTION COMPONENT

CHAPTER 7 OF THE LAND USE PLAN AMENDMENT

7.2 OIL PRODUCTION POLICIES

1. Oil production shall continue at Bolsa Chica until abandoned due to natural depletion of the recoverable oil or by early abandonment. This LUP does not preclude early public acquisition and abandonment of oil leases to facilitate accelerated ~~implementation of the Wetlands Restoration Program~~ ***wetlands***

restoration. Otherwise, the productivity and legal status of oil operations at Bolsa Chica shall not be significantly diminished by the implementation of new land uses permitted by this LUP unless agreed to by the affected oil operator/lessee. *(County Policy 7.2.1)*

2. Existing oil production shall be allowed to continue during and following implementation of wetlands restoration and development. *(County Policy 7.2.2)*

3. Oil production shall be managed to protect biological resources to the maximum extent feasible ***and shall be consistent with Sections 30260 through 30263 of the Coastal Act***. ~~Wherever possible, future oil facilities shall be sited so as not to conflict with the Wetlands Restoration Program~~. *(County Policy 7.2.3)*

4. In accordance with Federal, State, and local laws, and applicable agreements, oil operators shall be responsible for the clean up of areas to permit development and wetlands restoration. *(County Policy 7.2.4)*

5. As oil production within the Wetlands Ecosystem Area is phased out, the area shall be restored ***consistent with the Chapter 3 policies of the Coastal Act*** ~~in conformance with the Wetlands Restoration Program~~ and shall function as part of the wetlands system. *(County Policy 7.2.5)*

6. Adequate screening, setbacks, and aesthetic treatments shall be provided within development areas to minimize hazards and nuisances posed by the proximity of oil operations. These measures shall be implemented in conjunction with Coastal Development Permits, and by specific Oil Production Regulations that shall be set forth in the Bolsa Chica Planned Community Program. *(County Policy 7.2.6)*

7. All ~~new~~ development shall be designed in accordance with the provisions of California Public Resources Code Section 3208.1 and California Department of Conservation, Division of Oil and Gas Guidelines regarding specifications and standards for oil-related activities, and well abandonments and reabandonments. *(County Policy 7.2.7)*

8. Where oil production will continue within a development Planning Area or a ~~Wetlands Restoration Phasing Area~~ ***wetlands restoration area***, a plan shall be prepared indicating the continuing facilities and their relationship to ***the*** development area ***or wetland restoration***, and submitted to the County of Orange in conjunction with ~~the~~ ***any*** proposed ~~Coastal Development Permits~~ ***coastal development permit application involving the area*** ~~as set forth in the Bolsa Chica Planned Community Program~~. This plan shall **facilitate** ~~be consistent~~

~~with the Wetlands Restoration Program~~ ***wetlands restoration to the maximum extent feasible***. *(County Policy 7.2.8)*

~~9. An Oil Spill Prevention Control and Countermeasure Plan (OSPCCP) and an Oil Spill Contingency Plan (OSCP) has been prepared by the current oil operators, and approved by the California State Lands Commission, the California Department of Oil Spill Prevention and Response, and the California Department of Fish and Game. The Wetlands Restoration Program shall incorporate the requirements of the OSPCCP and OSCP. As the Wetlands Restoration Program is implemented, the OSPCCP and OSCP shall be updated to reflect each implementation phase. Both initial incorporation of requirements and subsequent updates shall be accomplished without requiring an amendment to the Bolsa Chica LCP.~~ *(County Policy 7.2.9)*

G. FINANCING AND PHASING COMPONENT

CHAPTER 8 OF THE LAND USE PLAN AMENDMENT

8.2 FINANCE AND PHASING POLICIES

1. No County General Funds shall be used for the construction of infrastructure improvements within Bolsa Chica, other than funds for Harriett Wieder Regional Park, or for regional road and flood control improvements approved by the County. The Landowner/Master Developer shall be responsible for construction of local roads and other infrastructure not otherwise financed by Federal, State, or special assessment districts formed for the Bolsa Chica LCP Area. *(County Policy 8.2.1)*

~~2. The expenditure of public funds to provide services in conjunction with public community facilities shall be made only for those service areas where development plans are fully consistent with this LCP.~~ *(County Policy 8.2.2)*

2. Residential development shall be phased in conjunction with the capacity of public facilities and services ***and the availability of public access and public recreation. Public trails and public parks identified in the certified LCP that are required to be irrevocably dedicated to the County or other public agency prior to the issuance of any coastal development permit approving any subdivision of the Bolsa Chica Mesa shall be improved by the private landowner/master developer prior to the issuance of any coastal development permit authorizing residential construction other than grading.***. *(County Policy 8.2.3)*

~~WETLANDS RESTORATION PHASING AND FINANCING POLICIES~~

~~4. The Wetlands Restoration Program shall be phased in consideration of the natural depletion of oil. The location, size, and sequence of Wetlands Restoration Phasing Areas shall reflect the anticipated phase out of oil production facilities within Bolsa Chica. Access roads, drill sites, and other areas required for ongoing oil production shall be held out of larger areas otherwise suitable for wetlands restoration until they are no longer needed for oil production.~~ *(County Policy 8.2.4)*

~~5. A financial implementation framework for wetlands restoration shall be prepared as part of the Wetlands Restoration Program. This framework shall include:~~

~~a. Estimated capital improvement cost for each phase of wetlands restoration;~~

~~b. Comprehensive implementation plans, which include property acquisition and capital improvements, as well as requirements for:~~

~~i. construction-period monitoring and maintenance;~~
~~ii. post-construction period monitoring and maintenance; and~~
~~iii. long-term monitoring/maintenance.~~

c. ~~Definition of the financial responsibilities and institutional arrangements that will assure the funding of items (a) and (b) above.~~
(County Policy 8.2.5)

~~6. The financial assurance for the wetlands restoration shall be provided as set forth in Table 8-1~~. *(County Policy 8.2.6)*

H. GLOSSARY
CHAPTER 9 OF THE LAND USE PLAN AMENDMENT

9.1 GLOSSARY

The meaning and construction of words, phrases, titles, and terms used in this Land Use Plan shall be the same as provided in Orange County General Plan and Zoning Code, except as otherwise provided in this Chapter.

1. **100-year-flood** — A measure of carrying capacity for a flood control channel, dam, or other water facility. A 100-year-flood is the largest that, according to rainfall and hydrology discharge probabilities, might occur in any 100-year period.

2. **1973 Boundary Settlement and Land Exchange Agreement (1973 Settlement Agreement)** — The 1973 agreement between the State of California and Signal Bolsa

Corporation giving the State fee title to a consolidated 300 acres, plus a lease option on an adjacent 230 acres dependent upon construction of an ocean entrance system, and clearing Signal's interest in the remainder of the property from regulation for public trust purposes.

3. **ambient noise** — The measure of normal, existing noise found at an outdoor location.

4. **average daily trips (ADT)** — The number of automobiles or other vehicular traffic passing a given point during an average 24-hour period. A round trip counts twice.

5. **berm** — An elongated mound of soil or sand.

6. **biological community** — An assemblage of plants and animals living in a specific area.

7. **biological diversity** — An index of habitat richness based on the number of species of plants and animals present.

8. Bluff Edge – Is the upper termination of a bluff, cliff, or seacliff. When the top edge of the bluff is rounded away from the face of the bluff as a result of erosional processes related to the presence of the steep bluff face, the edge shall be defined as the point nearest the bluff beyond which the downward gradient of the land surface increases more or less continuously until it reaches the general gradient of the bluff. In the case where there is a steplike feature at the top of the bluff face, the landward edge of the topmost riser shall be taken to the bluff edge. The termini of the bluff line, or edge along the seaward face of the bluff, shall be defined as a point reached by bisecting the angle formed by a line coinciding with the general trend of the bluff line along the seaward face of the bluff, and a line coinciding with the general trend of the bluff line along the inland facing portion of the bluff. Five hundred feet shall be the minimum length of the bluff line or edge to be used in making these determinations.

9. **Bolsa Chica LCP Area** — The approximately 1,588 acres of land within the unincorporated County of Orange~~,~~ which comprise the Bolsa Chica Segment of the County's North Coast Planning Unit for the purpose of preparing Local Coastal Programs. Located entirely within the Coastal Zone as defined by the California Coastal Act of 1976, it is under the land use planning, zoning, and regulatory jurisdiction of both the County of Orange and the California Coastal Commission.

10. **Bolsa Chica Local Coastal Program (LCP)** — The planning document prepared by the County of Orange ***and certified by the Coastal Commission*** to comprehensively satisfy the requirements of the California Coastal Act for the Bolsa Chica segment of the County's North Coast Planning Unit, and consisting of the Land Use Plan (LCP Part I), ***and*** Planned Community Program (LCP Part II~~), and Wetlands Restoration Program (LCP Part III)~~.

11. **Bolsa Chica Lowland (Lowland)** — The land between the Bolsa Chica Mesa and the Huntington Mesa, generally at or below the +5.0-foot mean sea level (MSL) contour,

although Rabbit Island has a few elevations greater than +5 MSL. The Lowland extends inland from Pacific Coast Highway to existing residential areas in the Coastal Zone of the City of Huntington Beach.

12. **Bolsa Chica Mesa** — The higher ground at the north end of the Bolsa Chica LCP Area, generally between Warner Avenue, Outer Bolsa Bay, and the Lowland.

13. **Bolsa Chica Project Area** — The approximately 1,615.5 acres defined ***in County EIR No. 551*** as the ~~1588~~ ***1,588*** acre County ~~LCP Area~~ ***Bolsa Chica LCP Segment (including the Fieldstone Property)*** and approximately 27.5 acres within the City of Huntington Beach, composed of 1.2 acres for the Mesa Connector; 9.4 acres for the EGGW Flood Control Channel; 2.7 acres in the Lowland adjacent to existing residential subdivisions; 5.1 acres for ~~the Tidal Inlet~~ ***a tidal inlet***; 6.7 acres in the Lowland below the terminus of Garfield Avenue, included in the ***1996 LCP*** Wetlands Restoration Program as Seasonal and Perennial Ponds; and, 2.4 acres in the Lowland at the end of Edwards Thumb and south of Talbert Avenue, included in the ***1996 LCP*** Wetlands Restoration ~~Area~~ ***Program*** as Seasonal Ponds.

14. **Bolsa Chica Study Area** — The approximately 1,973 acres within the Coastal Zone that includes both the Bolsa Chica LCP Area and approximately 385 acres within the City of Huntington Beach. Essentially the same Study Area boundary was utilized in the preparation of: a) the 1984 Habitat Conservation Plan prepared pursuant to Coastal Act Section 30237; b) the 1986 LUP certified by the Coastal Commission; c) the 1989 Bolsa Chica Planning Coalition Concept Plan; and d) Orange County's 1993 Draft EIR 551. The 385 acres within the City is primarily located in three distinct geographic areas — 1) the northern portion of Bolsa Chica State Beach owned by the State of California, 2) an inland portion of the Lowland owned by the Metropolitan Water District north of the EGGW Flood Control Channel, and 3) land on the Huntington Mesa north of Seapoint Street within the proposed boundary of Harriett Wieder Regional Park.

15. **Bolsa Gap** — The Lowland between the Bolsa Chica Mesa and Huntington Mesa.

16. **brackish marsh** — A non-tidal wetlands that receives sufficient runoff to allow emergent vegetation to develop; and may become more saline during summer, but is generally below 5 parts per thousand.

17. **Buffer** — Open space that ~~vertically and/or~~ horizontally separates and protects ***environmentally sensitive*** habitat areas from development areas. ***Buffer areas are not in themselves a part of the environmentally sensitive habitat area to be protected.*** Buffers may contain limited trail usage ***and other non-substantial structures such as interpretive signage that*** ~~but generally~~ serve to reduce the impact of human activities on wildlife.

18. **California Coastal Commission (Coastal Commission)** — The State agency established under Section 30300 of the California Coastal Act, designated as the coastal zone planning and management agency charged with implementing the Coastal Act.

19. California Coastal Conservancy — The State agency established in 1976 by the Legislature to purchase, protect, restore, enhance coastal resources, and to provide coastal access. The Conservancy works in partnership with local governments, other public agencies, non-profit organizations, and private landowners. Under Section 30237 of the Coastal Act, the Coastal Conservancy was to prepare a habitat conservation plan with the County of Orange for Bolsa Chica.

20. **California Department of Fish & Game (CDFG)** — The State agency having authority and responsibility to protect and enhance fish and wildlife resources and to administer State Ecological Reserve lands. ***Section 30237 of the Coastal Act, specifically authorizes this agency as the lead agency for wetlands identification purposes with respect to the preparation of the Habitat Conservation Plan for the Bolsa Chica Wetlands.***

21. **Certification** — The California Coastal Commission procedure to review Local Coastal Programs (i.e., Land Use Plans and Implementing Actions Programs) to determine if ~~they raise a substantial issue as to conformity with the policies set forth in the Coastal Act. If no substantial issues are raised, the Local Coastal Program is deemed certified~~. ***(1). a Land Use Plan or a Land Use Plan Amendment meets the requirements of and conforms with the Chapter 3 policies of the California Coastal Act; and (2) whether an Implementation Program conforms with and is adequate to carry out the provisions of the certified Land Use Plan.***

22. **Coastal Act of 1976 (Coastal Act)** — The State law codified as California Public Resources Code §30000 et seq., enacted to protect and enhance the coastal environment, and to guide and regulate local planning within the coastal zone to assure conformity with Statewide goals.

23. **Coastal Conservancy** — The State agency established under California Public Resources Code §31000-31405, having consultation and land stewarding responsibilities. It was specifically given lead agency authority under §30237 of the Coastal Act to ~~resolve differences~~ ***identify land use alternatives*** regarding Bolsa Chica through preparation of the Habitat Conservation Plan.

24. **Coastal Zone** — The coastal area defined in Coastal Act §30103, over which the Coastal Commission exercises jurisdiction. The entire Bolsa Chica LCP Area is within the Coastal Zone.

25. **Community Noise Equivalent Level (CNEL)** — An average of the noise level audible to the human ear occurring at an outdoor location during a 24-hour period, with extra

weighting given to noises occurring in the evening, and still heavier weighting to those at night.

26. **cordgrass** — A dominant plant (*Spartina foliosa*) that occurs in low saltmarsh habitats and is partially inundated by most high tides.

27. **culvert** — A pipe-like structure which conveys water under roadways or dikes; may be circular, square or rectangular in shape (e.g., box culverts).

28. **decibel (dB)** — The unit for expressing the relative intensity of sounds on a scale from 0 to 130, with incremental increases by logarithmic progression (i.e., on an accelerating curve rather than in straight line).

~~29. **Degraded Wetlands** — *A wetlands which has been altered by man through impairment of some physical property and in which the alteration has resulted in a reduction of biological complexity in terms of species diversity of wetland-associated species which previously existed in the wetlands areas.* (CDFG, 1981)~~

~~30. **Development Agreement** — A contract entered into pursuant to California Government Code §65864 et seq., by and between the County of Orange and the Landowner/Master Developer or any of its affiliates, subsidiaries, or otherwise- related companies, pertaining to the implementation of the Bolsa Chica Local Coastal Program (California Government Code Section 65864-65869.5).~~

31. **dike** — An embankment constructed to contain or confine ponded or tidal waters; also a structure used to separate areas with different hydraulic regimes.

32. **dredging** — The removal of bottom sediments in order to deepen or widen a channel, waterway, or wetland.

33. **Ecological Reserve** — The 306-acre State-owned area of the Lowland, a portion of which was restored in 1978 by the CDFG as a tide gate-regulated saltmarsh habitat. An "Ecological Reserve: is defined by California Fish and Game Code §1584 as: *Land or land and water areas which are designated as an ecological reserve by the commission pursuant to Section 1580 and which are to be preserved in a natural condition for the benefit of the general public to observe native flora and fauna and for scientific study* (Amended by Stats 1985, ch. 635.).

34. **Edwards Thumb** — ~~A geographical area consisting of about 32~~ ***Planning Area 1D containing approximately 51*** acres in the northeast corner of the Lowland, bordered by residential development in the City of Huntington Beach, the Huntington Mesa bluffs, and Edwards Street.

35. **emergent vegetation** — Erect, rooted, herbaceous, vascular plant species which are tolerant of prolonged hydration or saturation at the base of the plant but which do not tolerate prolonged total immersion (e.g., cattails).

36. **Endangered Species** — Any plant or animal listed under the Federal Endangered Species Act 16 U.S.C. §1531-1543, or the State Endangered Species Act, California Fish and Game Code §2050-2098, which is in danger of extinction throughout all or a significant portion of its range.

37. **endemic species** — Plants or animals that are restricted in distribution so that their species or subspecies is unique to an area.

38. **energy resource** — Any non-renewable resource, particularly petroleum or natural gas, used for fuel or other energy purposes.

39. **enhanced oil recovery** — Oil well injection or flooding with water, gas, steam, or chemicals to cause more oil to be recovered than would be achieved by unaided pumping.

40. **Environmentally Sensitive Habitat Area (ESHA)** — An area in which plant or animal life or their habitats are either rare or especially valuable because of their special nature or role in an ecosystem, and which could be easily disturbed or degraded by human activities and development.

41. **estuary** — A bay or lagoon that has an upland source of freshwater that regularly drains into it, and in which salinities are markedly reduced from typical seawater, at least periodically.

42. **existing wetlands** — ***Existing wetlands, include those lands which meet the definition of "wetlands" as defined in Section 30121 of the Coastal Act and as specified in Section 13577 of Title 14 of the California Code of Regulations. The wetland delineation conducted by the U.S. Environmental Protection Agency (EPA) entitled "A Determination of the Geographical Extent of Waters of the United States at Bolsa Chica, Orange County, California," as amended in 1992 and 1994 (February 10, 1989) may be used to assist in determining wetland areas to the extent it is not inconsistent with either Section 30121 of the Coastal Act or Section 13577 of Title 14 of the California Code of Regulations.*** ~~At Bolsa Chica, those lands identified and delineated in the February 10, 1989 U.S. Environmental Protection Agency (EPA) report entitled, "A Determination of the Geographical Extent of Waters of the United States at Bolsa Chica, Orange County, California," as amended in 1992 and 1994.~~

43. **exotic species** — Non-native plants or animals.

44. **flap-gate** — A structure to allow water flow in only one direction. At Bolsa Chica, these are currently used to prevent tidal waters from entering the EGGW Flood Control Channel, and muted-tidal waters from entering the Lowland, inland of the Ecological Reserve.

45. **foraging** — Specific behavior relating to searching for food; it does not require success.

~~44. **Full Tidal** — A hydrological regime in which only channel attenuation affects the tidal range, and including shoreline areas exposed to the unrestricted ebb and flow of the ocean's tides. Subtidal areas within this type of wetlands refer to depths below extreme low water, intertidal areas refer to both mudflats and vegetated marsh areas.~~

46. **functional capacity** — The ability of an environmentally sensitive area to be self-sustaining and to maintain natural species diversity.

47. **General Plan** — The comprehensive long-term plan for the physical development of, the County of Orange consisting of policies setting forth objectives, principles, standards, and generalized land use designations.

48. **geotechnical hazards** — The term covering potential dangers to person or property as a consequence of earthquake tremor or geological instability. It includes the effects of surface faulting, tsunami, liquefaction, subsidence, and subsidence-related to shallow peat deposits.

49. **gross area** — The entire land area within the boundary of a Planning Area or other area within the LCP area, including roads, common recreation facilities, slopes, and landscape areas.

50. **gross residential density** — The density of a residential project computed by dividing the total number of dwelling units by the gross area of the project in acres.

51. **habitat** — The biological area or type of environment within which an organism, population, or community normally lives or occurs.

52. **Habitat Conservation Plan (HCP)** — The plan authorized by the California Legislature in Coastal Act §30237 ~~and~~ ***to be approved by the Coastal Commission after it is*** jointly prepared by the Coastal Conservancy, and the Department of Fish and Game, in cooperation with the County and Major Landowner, to ~~resolve~~ ***assist in resolving*** land use planning differences at Bolsa Chica and provide for the conservation of the habitat of fish and wildlife resources.

53. **Harriett Wieder Regional Park** — The planned 106-acre Orange County regional park along the Huntington Mesa to link Huntington Central Park and Bolsa Chica State Beach. (Historically known as Bolsa Chica Linear Park and Bolsa ~~chica~~ ***Chica*** Regional Park.)

54. **HCP Parties** — Parties that agreed upon land use allocations and configurations in the process of preparing the Bolsa Chica Habitat Conservation Plan ***that is to be submitted to and approved by the Coastal Commission purusant to Section 30237 of the Coastal***

Act, specifically the Coastal Conservancy, Department of Fish and Game, County, and Major Landowner Signal Bolsa Corporation.

55. **Huntington Mesa** — The higher ground at the south end of the Bolsa Chica LCP Area, generally between Seapointe Street and the Lowland.

56. **hydrologic regime** — The presence and flow patterns of water within a portion of the Wetlands Ecosystem Area.

57. **hypersaline** — Soil or water with a salt content greater than that of sea water (i.e., typically 34,000 parts per million).

58. **Implementing Actions Program (IAP)** — As defined in §30108.4, ***of the Coastal Act,*** the zoning ordinances, regulations or programs which implement either the provisions of the certified local coastal program or the policies of the Coastal Act.

59. **infaunal species** — Organisms living beneath the substrate's surface (e.g., polychaete worms, burrowing clams).

60. **intertidal flats** — Wetlands areas which are typically less than 30 percent vegetated, displaying areas of open sand or mudflats, and which are exposed between high and low tides.

61. **lagoon** — An area of saltwater or brackish water separated from the adjacent sea by a low-lying sand or similar barrier; there may or may not be an open connection channel to the sea.

62. **land use plan** — As defined in Coastal Act §30108.5: *the relevant portions of a local government's general plan or local coastal element that are sufficiently detailed to indicate the kind, location, and intensity of land uses, the applicable resource protection and development policies to accomplish Coastal Act objectives and, where necessary, a listing* ***of*** *implementing actions*.

63. **Land Use Plan (LUP)** — ~~This Bolsa Chica Land Use Plan (First Amendment) document, one~~ ***One*** of the ~~three~~ ***two*** principal components of the Bolsa Chica Local Coastal Program, approved by the County of Orange Planning Commission**,** ~~on November 30, 1994 by Resolution No. 94-13 and adopted by~~ the Orange County Board of Supervisors ~~on December 14, 1994 by Resolution No. 94-1341~~***, and the California Coastal Commission***.

64. **Landowner/Master Developer** — ~~Koll Real Estate Group~~ ***Hearthside Homes/Signal Landmark***, the major property owner ~~in~~ ***on*** the Bolsa Chica ~~Lowland. Other significant property owners include the State Lands Commission, the Metropolitan Water District, and the Fieldstone Corporation~~ ***Mesa***. ***(Hearthside Homes is the Master Developer managing the property assets of Signal Landmark, the Landowner.)***

65. **lateral migration** — Movement of groundwater horizontally through the soil.

66. **liquefaction** — The phenomenon in which a cohesionless soil below the water table loses its strength during the groundshaking of an earthquake.

67. **littoral drift** — Movement of sand or other sediment up- or down-coast as a result of wave action. Subject to interruption and resultant change in beach profiles by construction of shoreline facilities, such as breakwaters or jetties.

68. **Local Coastal Program (LCP)** — As defined in Coastal Act §30108.6: *local government's land use plans, zoning ordinances, zoning district maps, and implementing actions that, when taken together, meet the requirements of, and implement the provisions and policies of, the Coastal Act at the local level.*

69. **Lowland** — See Bolsa Chica Lowland.

~~69. **Master Oil Facilities Plan** — A component of the Master Coastal Development Permit as required by the Bolsa Chica Planned Community Program.~~

70. **mean lower low water (MLLW)** — The average height of the lower of the daily low tide over a 19-year period.

71. **mitigation** — As defined in §15370 of the State Guidelines for the California Environmental Quality Act, mitigation includes:

    (a) Avoiding the impact altogether by not taking a certain action or parts of an action.
    (b) Minimizing impacts by limiting the degree or magnitude of the action and its implementation.
    (c) Rectifying the impact by repairing, rehabilitating, or restoring the impacted environment.
    (d) Reducing or eliminating the impact over time by preservation and maintenance operations during the life of the action.
    (e) Compensating for the impact by replacing or providing substitute resources or environments.

~~72. **Mitigator** — As used in the context of implementing wetlands restoration under Option A, a Mitigator is a third party who seeks to use wetlands restoration at Bolsa chica to compensate for unavoidable adverse impacts to, or losses of, existing wetlands and ESHAs outside of Bolsa Chica.~~

~~73. **Muted Tidal** — A hydrologic regime in which the tidal regime is controlled within a range narrower than the ocean's natural Full Tidal range. For purposes of the Bolsa Chica Wetlands Restoration Program, the Muted Tidal range will be less than 75 percent of the ocean tide experienced on the adjacent State Beach and may be achieved using stationary or movable structures.~~

74. **navigable waters** — For purposes of the Clean Water Act (Code of Federal Regulations, Section 329.4: *Navigable Waters of the United States are those waters that are subject to the ebb and flow of the tide and/or are presently used, or have been used in the past, or may be susceptible for use to transport interstate or foreign commerce*.

75. **non-tidal pickleweed** — A term of convenience for ***the*** Bolsa Chica ***LCP submittal***, which denotes the many large hydraulically-isolated cells currently containing ~~remnant~~ stands of pickleweed ***(Salicornia spp.)***, now surrounded by roads and levees, yet functioning as important habitat for the State-listed endangered Belding's savannah sparrow.

~~76. **Non-tidal** — A non-tidal hydrologic regime in which no tidal influence occurs.~~

~~77. **northeast Lowland** — Those lands in the Lowland located within Planning Areas 3D, 4C, 10, and 11, approximately 1,000 feet seaward of the existing homes in the City of Huntington Beach.~~

76. **NPDES Permit** — A permit controlling discharge into Federal waters governed by the national pollutant discharge elimination systems program (i.e., the ocean and its tributaries); and issued locally by the Santa Ana Regional Water Quality Control Board, to meet objectives for the beneficial uses of waterways by limiting suspended solids and toxics within the discharge.

77. **oil production** — Activities required for the extraction, processing, and transportation of oil, gas, and related compounds.

~~80. **Option B (TI—Alt. G)** — The title for Land Use Plan Option B as proposed by the Orange County EMA combined with the Tidal Inlet from Revised EIR 551 Alternative G, dated August 22, 1994. Option B (TI—Alt G) is the name applied to the Planning Commission-approved LCP documents prior to Board of Supervisors adoption of Resolution No. 94-1341. It included from a wetlands restoration perspective, a non-navigable Tidal Inlet at the south end of Bolsa State Beach parking lot to provide an improved water source and increase the Full Tidal area. This replaced Option B's original proposal to provide water for expanded wetlands restoration via Anaheim Bay and Huntington Harbor. The Tidal Inlet for Option B (TI—Alt. G) was environmentally evaluated in the (original) Draft EIR 551, dated December 22, 1993.~~

~~From a development perspective, compared to Option B's original proposal, Option B (TI—Alt. G) increased the maximum number of dwelling units for the LCP Area from 3,200 to 3,300 (retaining a maximum of 900 homes in the northeast Lowland), changed the Lowland Community Park from 15 acres to 8 acres (fully satisfying Local Park Code requirements), and added various interpretive facilities to the Wetlands Restoration Program in conjunction with the new Tidal Inlet, such as new nature trails and a ranger-operated kayak/canoe facility near the Tidal Inlet.~~

78. **Orange County** ~~**Environmental Management Agency**~~ ***Planning and Development Services (PDSD)*** — The Orange County agency that encompasses planning; building; flood control; harbors, beaches, and parks; and other departmental functions. The Environmental Management Agency is responsible for preparation of the Bolsa Chica Local Coastal Program.

79. ***Orange County Public Facilities and Resources Department (PFRD) — The Orange County agency that encompasses flood control and harbors, beaches, and parks; and other department functions.***

80. **Outer Bolsa Bay** — The (unrestored) Full Tidal Area within the existing Ecological Reserve, that connects the currently restored portion of the Reserve with the Pacific Ocean (i.e., via Huntington Harbour and Anaheim Bay).

81. **Perennial Ponds** — Open, non-tidal ponds that receive and capture sufficient water from rainfall and surface runoff so that they do not dry out during the summer.

82. **pickleweed habitat** — Saltmarsh areas ***and non-tidal areas (see definition #75)*** where the vegetation is dominated by common pickleweed (*Salicornia virginica*).

83. **Pocket Area** — Historically, the topographically isolated area of the Lowland between the EGGW Flood Control Channel berms and the southern base of the Bolsa Chica Mesa.

84. **restoration** — Activity to improve generally destroyed or degraded wetlands or other habitat areas to a viably functioning level of biological productivity and diversity.

85. **rip-rap** — Generally, random-shaped stone used at the base of bluffs, dikes, and revetments to protect against scouring by the force of water.

86. **salt marsh** — A vegetated wetlands — typically with more than 30 percent ***plant*** coverage — where ***the*** dominant plants are ~~grasses and low-growing succulents~~ ***obligate or faculative wetland species***. In Southern California ***salt*** marshes, typical plants include pickleweed, sea blite, salt grass, saltwort, and marsh heather.

87. **Seasonal Ponds** — Open non-tidal ponds that receive precipitation and surface runoff insufficient to remain wet during the summer. Seasonal ponds tend to be relatively flat with little vegetation on the fringe and a barrier white or off-white color appearance during the summer from accumulated salts in the soil.

88. **seawater intrusion** — The onshore, underground movement of seawater into inland water tables (aquifers).

89. **Sensitive Species** — Endangered or threatened species of flora and fauna listed by Federal and/or State governments, including Federal Candidate 1 listings.

90. **shoreline structure** — Any manmade structure, including ***rip-rap,*** groins, jetties, piers, and retaining walls, in the littoral zone.

91. **Study Area** — The approximately 1970-acre area that includes both the unincorporated Bolsa Chica Local Coastal Program Area within County's jurisdiction and contiguous portions of the City of Huntington Beach that were both included in the 1986-certified LUP, and identified by the California Department of Fish and Game for its wetlands determination and Habitat Conservation Plan.

92. **Target Species** — A key species that utilizes a specific habitat type and whose population size or density is correlated to habitat quality (e.g., Belding's savannah sparrow is a target species for pickleweed).

93. ~~**Tidal Inlet**~~ ***tidal inlet*** — A ***potential*** channel cut through Bolsa Chica State Beach to provide tidal flows to restored wetlands and ***to*** accommodate discharge of ***any freshwater sources that drain into the wetlands through rainfall, runoff, or overflow*** waters from the flood control channel.

94. **tidal gate** — A structure to control tidal flow in either direction (as opposed to a flap-gate), and used to limit the volume of water flowing in and out, and thus regulate the high and low range of tidal fluctuation in an area.

95. **tidal prism** — The volume of water that ~~moves into and out of a Full Tidal Area with the rise and fall of each tide~~ ***flows in and out of an area subject to tidal flows between higher-high tide and lower-low tide***.

96. **tidal range** — The total difference in water level (elevation) between high and low tides.

97. **turbidity** — A cloudy condition in the water caused by the presence of suspended particles which reduce light transmission.

98. **U.S. Army Corps of Engineers (ACOE)** — The Federal agency that reviews navigation aspects of development projects, conducts design studies, and issues dredge and fill permits under the Clean Water Act, and water construction permits under the Rivers and Harbors Act of 1899.

99. **U.S. Fish and Wildlife Service (USFWS)** — The Federal agency with authority and responsibility for protecting fish and wildlife resources, especially threatened and endangered species, and providing consultation and technical assistance to permitting agencies (e.g., ACOE), regarding the potential effects of proposed actions upon those resources.

100. **visitor-serving facilities** — Facilities that fulfill the Coastal Act purpose of providing public access***,*** ~~and~~ ***public*** recreation ***including commercial facilities which cater primarily to visitors (such as restaurants, cafes, retail specialty stores, or retail***

business orientated to the needs of park and wetland area visitors.) within the Coastal Zone.

101. **Warner Avenue Pond** — An area on the Bolsa Chica Mesa adjacent to Warner Avenue that ***consists of wetlands as defined by the Coastal Act and also*** has been designated as "Waters of the United States". ~~Warner Avenue Pond is low point along the south side of the roadway where runoff ponds behind the blockage of a flood control pipe that otherwise would empty into Huntington Harbour~~.

102. **Waters of the United States** — Defined in Clean Water Act, (Code of Federal Regulation Section 326.3): *All navigable waters of the United States (see above), all interstate waters including interstate wetlands, and all other waters such as intrastate lakes, rivers, streams (including intermittent streams), mudflats, sandflats, wetlands, sloughs, prairie potholes, wet meadows, playa lakes, or natural ponds, the use, degradation or destruction of which could affect interstate or foreign commerce . . . .*

103. **Wetlands** — ~~State~~ ***Coastal Commission*** Definition~~: As defined~~ ***The definition of wetlands is contained*** in Coastal Act §30121 ***and is utilized for purposes of acting on coastal development permits. Section 30121 establishes that***: *"wetlands" means lands within the coastal zone which may be covered periodically or permanently with shallow water and include saltwater marshes, freshwater marshes, open or closed brackish water marshes, swamps, mudflats and fens (see also~~,~~* ***the definition of*** *"existing wetlands")* ***and the definition contained in Section 13577 of Title 14 of the California Code of Regulations***.

104. **Wetlands** — Federal Definition: *[T]hose areas that are inundated or saturated by surface of groundwater at a frequency and duration sufficient to support and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. Wetlands generally include swamps, marshes, bogs, and similar.* 33 C.F.R. §328.3(b).

105. **Wetlands Ecosystem Area** — ***The Wetlands Ecosystem Area is comprised of all of Planning Areas 1A, 1B, and 1D (which includes the Edwards Thumb area) as shown in County Figure 2.1-1***. ~~The collective area of wetlands, ESHAs, buffers, and non-tidal open space areas which are the subject of the Wetlands Restoration Program totaling, within the Bolsa Chica Planned Community, approximately 1,098 acres, and within the City of Huntington Beach, approximately 15 acres, for a total of 1,113 acres.~~

106. **Wetlands Restoration** ***Plan*** ~~**Program**~~ — ~~The Implementing Actions Program of the Bolsa Chica LCP, to consolidate, preserve, create and restore wetlands, ESHAs, Buffers and non-tidal open space areas at Bolsa Chica~~. ***A comprehensive plan being prepared by the State of California and the U.S. Department of the Interior to restore the Wetlands Ecosystem Area***.

VII. IMPLEMENTATION PLAN SUGGESTED MODIFICATIONS

Suggested Modifications: The Commission certifies the following, with modifications as shown. Language as submitted by Orange County is shown in straight type. Language recommended by the Commission for ~~deletion~~ is shown in ~~line out.~~ Language proposed to be ***inserted*** by the Commission is shown in ***underlined boldface italic***.

The regulation numbers shown below conform to the Bolsa Chica Local Coastal Program as published by the County of Orange on December 14, 1994 that were submitted to the Commission in June 1995. Additionally the Implementation Program regulations incorporate changes made to department names and titles as a consequence of a reorganization by the County of Orange. Regulations, which are being changed to reflect this name change, are not shown as part of the suggested modifications to minimize the size of this document. The addition of new regulations or the deletion of regulations (as submitted) will affect the numbering of subsequent regulations when the County of Orange publishes the final Bolsa Chica LCP after Commission certification. Regulations which must be simply renumbered and do not otherwise require any modifications will not be shown. Below are the suggested modifications.

A. PLANNED COMMUNITY PROGRAM

Global Text Suggested Modification: Due to a renaming of the Orange County Environmental Management Agency, all text in the Bolsa Chica Planned Community Program which cites the "*Environmental Management Agency*" or "*EMA*" shall be revised to cite either "*Planning and Development Services*" or "*PDSD*". Since this suggested modification refers to a global text revision, once the global text revisions are made, this suggested modification does not need to be included in the Bolsa Chica Planned Community Program.

Global Text Suggested Modification: Due to the deletion of the Wetlands Restoration Program from the Bolsa Chica LCP, all text in the Bolsa Chica Planned Community Program which cites the Wetlands Restoration Program shall be revised to delete references to the Wetlands Restoration Program. Since this suggested modification refers to a global text revision, once the global text revisions are made, this suggested modification does not need to be included in the Bolsa Chica Planned Community Program.

Graphic Suggested Modification: All figures and text based on the Community Zoning Map (Figure A-1) contained in the Bolsa Chica Local Coastal Program of December 14, 1994 shall be modified as necessary to be consistent with **Figure 1** (Page 5). Since this policy refers to a graphic revision, once the graphic revisions are made, this policy does not need to be included in the amended Land Use Plan.

Graphic Suggested Modification: All figures and text based on the Planned Community Statistical Summary (Figure A-2) contained in the Bolsa Chica Local Coastal Program of December 14, 1994 shall be modified to conform to the Land Use Plan as depicted in **Figure 1** (page 5) of this staff report. Since this policy refers to a graphic revision, once the graphic revisions are made, this policy does not need to be included in the amended Land Use Plan.

Graphic Suggested Modification: All figures and text based on the Planned Community Map (Figure B-2) contained in the Bolsa Chica Local Coastal Program of December 14, 1994 shall be modified to conform to the Land Use Plan as depicted in **Figure 1** (page 5) of this staff report. Since this policy refers to a graphic revision, once the graphic revisions are made, this policy does not need to be included in the amended Land Use Plan.

Graphic Suggested Modification: Figure 1.2 (the Bolsa Chica Process Flow Chart) of the LCP, as submitted, shall be deleted. Figure 1.3 (Local Coastal Program Components) shall be revised to show that the Local Coastal Program is divided into two parts, an LUP component and an IP component. Any references (in any graphic) to the "*Wetlands Restoration Program*" or the Development Agreement as part of the Implementation Program, as submitted, shall be deleted. The word "*confirmation*" used in referencing the land use plan shall be replaced with the word "*amended*" in Figure 1.3 or any other instance where this terminology is used.

1. PURPOSE AND OBJECTIVES

1.3 ORGANIZATION OF THE LOCAL COASTAL PROGRAM

The Bolsa Chica LCP was submitted by the Orange County ~~Environmental Management Agency~~ ***Planning and Development Services Department*** for the purpose of (1) comprehensively satisfying the requirements of the California Coastal Act for this area; and (2) establishing the County's General Plan, ***and*** Planned Community Program~~, and Wetlands Restoration Program~~ for the Bolsa Chica Segment of the North Coast Planning unit of the County's Local Coastal Program.

The Bolsa Chica LCP is organized in ~~three~~ ***two*** parts as illustrated in Figure ~~1.3~~ ***1.2***:

~~1.3.3 Wetlands Restoration Program (LCP Part III)~~

~~The Wetlands Restoration Program is the second Implementing Actions Program for the LUP, and is necessary to implement LUP policies for the restoration and conservation of sensitive coastal resources areas within Bolsa Chica.~~

~~The Wetlands Restoration Program provides for the consolidation, creation, and restoration of hydrologic regimes (i.e., habitats), Environmentally Sensitive Habitat Areas, and Buffers within the "Wetlands Ecosystem Area." It comprehensively sets forth:~~

- ~~Restoration Strategy;~~
- ~~Description of Restoration Plan;~~
- ~~Policies, Regulations, and Procedures;~~
- ~~Implementation Plan;~~
- ~~Mitigation Monitoring and Maintenance Programs;~~
- ~~Interagency Reviews and Approvals;~~
- ~~Analysis Related to County EIR No. 551; and~~
- ~~Preliminary Cost Estimates.~~

2. PURPOSE AND OBJECTIVES

2.1 GENERAL PROVISIONS

2.1.3 General plan Overly District of Special Studies-Geology (Alquist-Priolo) District Regulations

Development within the Special Studies-Geology (Alquist-Priolo) Overlay District shall submit a geotechnical investigation identifying any active traces of the Newport/Inglewood Fault ~~and establishing any~~ ***identifying any*** required building setback lines ~~prior to issuance of building~~ ***at the time of submittal of any application for a coastal development permit that would approve subdivision or development of land for residential purposes.*** Habitable development on active faults shall be prohibited ***and shall be setback, at a minimum, in accordance with the Alquist-Priolo Act requirements***. Development in areas subject to high probability of liquefaction shall be properly mitigated to limit risks to life and property.

2.1.2 Zoning Code Consistency

This PC Program regulates all development within Bolsa Chica Planned Community. In cases where sufficient direction for interpretation of these regulations is not explicit in this text or the approved LCP Land Use Plan, the ~~Orange County Zoning Code~~ ***Coastal Act*** shall provide direction~~, as determined by the Director, EMA~~. In case of difference between this PC Program and the Orange County Zoning Code, this PC Program takes precedence.

2.1.4 Zoning Code Combining and Overlay Districts

1. CD "Coastal Development" (Combining) District:

Development within the CD "Coastal Development" (Coastal Zone) District shall require approval of a Coastal Development Permit in accordance with the regulations contained in this PC Program and Orange County Zoning Code Section 7-9-118, CD "Coastal Development" District Regulations.

2. FP "Floodplain" (Overlay) District:

Development within the FP "Floodplain" (Overlay) shall comply with the regulations contained in the Orange County Zoning Code Section 7-9-113, FP "Floodplain" District Regulations.

3. O "Oil Production" (Overlay) District:

Production of oil within the O "Oil Production" (Overlay) District shall comply with the regulations contained in Chapter 9 of this PC Program, and with Orange County Zoning Code Section 7-9-117, Oil Production, and the Orange County Oil Code, except as specifically provided in this PC Program.

4. SR "Sign Restrictions" (Overlay) District :

Development within the SR "Sign Restrictions" (Overlay) District shall comply with the regulations contained in Chapter 8 of this PC Program and Orange County Zoning Code Section 7-9-111, SR "Sign Restrictions" District Regulations.

5. PD "Planned Development" (Overlay) District:

Development within the PD "Planned Development" (Overlay) District shall comply with the regulations contained in this PC Program and Orange County Zoning Code Section 7-9-110, PD "Planned Development" District Regulations.

~~**6. NC "Neighborhood Commercial" (Overlay) District:**~~

~~Development within the NC "Neighborhood Commercial" (Overlay) District is limited to Planning Area 6 and shall comply with Sections 5.4.1.2.b and 5.5.4 of this PC Program.~~

2.1.11 Annual Monitoring Report

An Annual Monitoring Report (AMR) shall be prepared and submitted by the Landowner/Master Developer each calendar year to the County Administrative Office and the Orange County ~~Environmental Management Agency~~ ***Planning and Development Services Department***. Submittal of an AMR is required for conformance with the Growth Management Program of the Land Use Element of the Orange County General Plan and the County's Annual Development Monitoring Program.

The Board of Supervisors, in the annual adoption of the Development Monitoring Program, may identify a significant imbalance between development projections and planned infrastructure ~~or in the proportionate development of residential, commercial, and employment land uses~~. The Board of Supervisors may then defer subdivision approval within the Planned Community until measures capable of resolving the imbalances are proposed to, and approved by, the Board of Supervisors. ***No proposed changes to the policies and standards of the certified LCP shall be effective without an LCPA certified by the Coastal Commission.*** The AMR will be the project proponent's opportunity to demonstrate mitigation measures and implementation strategies which will ensure adequate infrastructure for the community.

~~2.1.12 Application of Regulations~~

~~If an issue, condition, or situation arises that is not sufficiently covered or provided for in this PC Program so as to be clearly understandable, the Director, EMA, shall determine which regulations are applicable, as authorized by Orange County Zoning Code Section 7-9-20 (c), "Indeterminate applicability."~~

~~Those regulations of the Zoning Code that are applicable for the most similar use, issue, condition, or situation shall be used by the Director, EMA, as guidelines to resolve the unclear issue, condition, or situation.~~

2.1.15 Planning Commission Review

Pursuant to Orange County Zoning Code Section 7-9-150.3, the Director, ~~EMA~~ ***PDSD*** shall determine which items are to be heard by the Planning ***Commission***.

2.2 SPECIAL PROVISIONS

2.2.1 ~~Maximum Dwelling Units~~ *Density of Development*

~~The maximum number of dwelling units that may be built within the Bolsa Chica Planned Community is shown on the PC Development Map and Statistical Table (see Appendix). No Residential Planning Area shall exceed the maximum number of dwelling units indicated for that Planning Area in the PC Development Map and Statistical Table.~~

Residential development shall be distributed throughout the portions of the Bolsa Chica Mesa designated for residential development consistent with the Planned Community Statistical Table and shall not exceed a total of 1,235 residential units. All coastal development permits for the Bolsa Chica Mesa shall conform with the allocation of maximum dwelling units contained in the LCP's Planned Community Statistical Table in terms of both the Planning Area limits and the overall limit of 1,235 residential units. Development Areas created pursuant to any coastal development permit, as well as subsequent subdivision(s) of those Development Areas, shall not result in the creation of residential lots or parcels which do not have residential units associated with their future development. The intent of this policy is to ensure that no circumstance is created wherein the development of the Bolsa Chica Mesa would ever exceed the aforementioned 1,235 maximum residential units. This residential cap on the total number of units on the Bolsa Chica Mesa applies to and includes all current and subsequent ownerships on the Mesa, and any development rights that may accrue from the Edwards Thumb parcel.

2.2.3 Planning Area Boundaries

3. Planning Area boundaries and acreages contained in this PC Program are approximate based upon current information and a generalized level of mapping. Final Planning Area boundaries shall be established ~~by the~~

through both Coastal Development Permit and~~/or~~ ~~Tentative/ Final~~ ***Tentative/Final*** Tract Map approval.

4. The circular ~~symbols~~ ***symbol*** which ~~are~~ ***is*** used on the Planned Community Development Map to conceptually identify Public Facility Planning ~~Areas~~ ***Area*** 4B ~~and 4C~~ (i.e., the water storage reservoir ~~and fire station~~) ~~are~~ ***is*** not intended as ***a*** precise Planning Area ~~boundaries~~ ***boundary*** or ~~locations~~ ***location*** ~~(e.g., the Orange County Fire Department shall determine the ultimate location of the fire station)~~. The final and precise ~~boundaries~~ ***boundary*** and ~~locations~~ ***location*** shall be established by ~~the~~ ***a*** Coastal Development Permit ~~and/or Tentative/Final Tract Map approval(s).~~

~~5. The circular symbol "NC" used on the Planned Community Development Map to conceptually identify the potential for neighborhood commercial facilities at the intersection of Warner Avenue and the Mesa Connector is not a Planning Area boundary. The precise location and size of any neighborhood commercial facilities, not to exceed 10 acres, shall be established by the Coastal Development Permit and/or Tentative/Final Tract Map approval(s) for Planning Area 6, and shall not affect the number of units or adjustments to Planning Area boundaries permitted by Chapter 11.~~

2.2.4 Flood Control Facilities

The Landowner/Master Developer shall fund (either directly or through an assessment district) and construct all required on-site flood control facilities ~~in a manner meeting the approval of the Director, EMA~~ ***consistent with all applicable policies of this LCP***.

~~2.2.6 Local Park Implementation Plan~~

~~A Bolsa Chica Local Park Implementation Plan (LPIP) shall identify requirements and locations for local park sites and recreation areas within the planned community, and include an implementation program.~~

~~The Local Park Implementation Plan shall be submitted to and approved by the Orange County Planning Commission in conjunction with the first Master Coastal Development Permit, as set for in Chapter 10.~~

~~The LPIP will implement all applicable local park policies set forth in the Bolsa Chica Land Use Plan, fully satisfy Orange County's Local Park Code~~

~~requirements (i.e., County Ordinance No. 3518), and be consistent with the Orange County Recreation Element's Master Plan of Local Parks".~~

~~The location and size of the local community parks shall be approximately as shown on the Development Map and Statistical Table for the Bolsa Chica Planned Community. At the same time, it is recognized that the final configuration of Recreation Planning Areas 3A, and 3B (the Mesa Community Park and Lowland Community Park) may be significantly revised to reflect site planning considerations and the specific park and recreation facilities set forth in the approved LPIP. Park facilities shall be designed to minimize the impacts of recreational activities (noise, lighting, etc.) on surrounding residential areas. Impacts may be reduced by locating high activity areas away from residences, and through the use of landscaping, setbacks, walls, fencing and/or other screening methods intended to achieve compatibility between the residential and recreational land uses.~~

2.2.9 Private Street and Driveway Standards

Private streets and driveways may be established in accordance with ***all of*** the following minimum standards:

1. Streets or driveways serving four (4) or less dwelling units and having no parking within the travelway: Minimum paved width shall be twelve (12) feet for one-way traffic, and twenty (20) feet for two-way traffic.

2. Streets or driveways used primarily for access to garages or carports for more than four (4) dwelling units and with no parking within the travelway: Minimum paved width shall be twelve (12) feet for one-way traffic, and twenty-four (24) feet for two-way traffic.

3. Streets and driveways where on-street parking will be limited to one side only: Minimum paved width shall be thirty-two (32) feet.

4. Streets and driveways with on-street parking permitted on both sides: Minimum paved width shall be thirty-six (36) feet.

5. ***Private roads which limit the public's ability to park within the residential areas shall not be allowed unless a public parking lot containing a minimum of thirty (30) spaces is provided.***

2.2.10 Public Road Design Standards within the Planned Community

Arterial highways, collectors, and local streets within the Bolsa Chica Planned Community shall be designed and constructed in accordance with Orange

County ~~EMA~~ ***PDSD*** Design Standards, ~~or as approved by the Orange County Subdivision Committee~~ ***and shall be consistent with all policies of the certified LUP including the Public Access/Visitor Serving Recreation policies of the LUP. Public roads shall provide public on-street parking.***

2.2.11 Off-site Roadway Improvements/Area Traffic Improvement Program

~~The off-site roadway improvements outlined in Chapter 5, Circulation/ Transportation Component, of the Bolsa Chica LCP Land Use Plan shall be constructed in accordance with the Bolsa Chica Area Traffic Improvement Program (ATIP).~~

Arterial highways, collectors, and local streets within the Bolsa Chica Planned Community shall be designed and constructed in accordance with Orange County ~~EMA~~ ***PDSD*** Design Standards, or as approved by the Orange County Subdivision Committee ***and shall be consistent with all policies of the certified LUP including the Public Access/Visitor Serving Recreation policies of the LUP***.

The ***Area Traffic Improvement Program (***ATIP***)*** ~~fully implements~~ ***prepared by the landowner/developer shall be consistent with the Bolsa Chica LCP Land Use Plan including Policies 5.2.1 through 5.2.11, and shall fully implement*** the LUP's Regional Circulation/Transportation Policies in order to mitigate development traffic impacts within the context of the larger regional area. ***The ATIP may be incorporated into the LCP only through an LCP amendment certified by the Commission.***

2.2.12 Grading Plans

Grading Plans for all projects within the Bolsa Chica Planned Community shall be consistent with the Orange County Grading and Excavation Code, and Orange County Zoning Code Section 7-9-139, "Grading and Excavation," with the following provisions:

1. Grading Plans***, including conceptual grading plans,*** shall be ***submitted as part of any coastal development permit application for grading and shall be*** accompanied by geological and soils engineering reports approved by the Manager, ***Subdivision Grading Services*** ~~Orange County EMA Development Services, and shall incorporate all pertinent recommendations prior to issuance of Grading Permits~~. ***The geological and soils engineering reports shall analyze alternatives to the proposed grading and certify that the proposed grading plan, including any necessary recommendations to mitigate adverse***

conditions, minimizes landform alteration to the maximum extent feasible and that there is no less environmentally damaging alternative. The soils engineer/engineering geologist must certify the suitability of a graded site before ***coastal development permits or*** Building Permits may be issued. ***All coastal development permits for grading shall require that evidence of all necessary geologic and soils recommendations have been incorporated into all building and grading plans be provided prior to issuance of any coastal development permits for the proposed grading.***

2. ***Approved grading plans shall show all areas of grading, including remedial grading, for an area of development provided that grading in support of residential development does not encroach into either Conservation or Open Space and Recreation areas.*** ~~An approved Grading Plan shall show all areas of grading, including remedial grading, inside and outside of an immediate area of development. Grading shall be permitted within all Planning Areas of the Planned Community outside of an area of immediate development, for the grading of public roads, highways, park facilities, infrastructure, and other development-related improvements. Remedial grading for development shall also be permitted in all Planning Areas outside of an area of immediate development to address geotechnical or soils engineering problems.~~ The Grading Plan shall include provisions for temporary erosion control on all graded site scheduled to remain unimproved between October 15 and April 15 of any year.

2.2.13 Protection of Archaeological and Paleontological Resources

1. A comprehensive archaeological research design***, including detailed mitigation programs for archeological and paleontological resources,*** ~~for the Bolsa Chica Planned Community~~ shall be prepared and submitted ***along with any coastal development permit application for development within any planning area containing archeological and paleontological resources*** ~~to the County of Orange prior to approval of the first Coastal Development Permit for land use development~~, consistent with Section 3.4, Cultural Resources Component, of the Bolsa Chica LCP.

~~2. Prior to the approval of a Tentative Subdivision Map, except a map for financing or conveyance purposes, detailed mitigation programs for archaeological and paleontological resources, established in accordance with the Board of Supervisors' Archaeological/ Paleontological Policies,~~

~~shall be submitted to and approved by the Manager, Orange County EMA-Harbors, Beaches and Parks/Program Planning Division.~~

2. In the event that any Native American human remains are uncovered; the County Coroner, the Native American Heritage Commission, and the Most Likely Descendants shall be notified. The recommendations of the Most Likely Descendants, as designated by the California Native American Heritage Commission, shall be obtained prior to the reburial of any prehistoric Native American human remains.

3. An archaeological research design shall be submitted along with any application for a coastal development permit for development within any planning area containing archaeological or paleontological resources. The research design shall:

a. contain a discussion of important research topics that can be addressed employing data from the Bolsa Chica sites; and
b. be reviewed by at least three (3) County-certified archaeologists (peer review committee).
c. The research design shall be reviewed by the State Office of Historic Preservation and the Native American Heritage Commission.
d. The research design shall be developed in consultation with affected Native American groups.
e. The peer review committee shall assure the implementation of mitigation measures consistent with the archeological research design.

4. A systematic cultural resources survey of any planning area shall be initiated and completed before an application is submitted for any coastal development permit affecting that planning area to determine if there are any cultural deposits, and if so, to evaluate their significance. The determination of significance shall be based on the requirements of the California Register of Historical Resources criteria. If found to be significant, the site(s) shall be tested and preserved in open space or, if preservation cannot be accomplished consistent with the LUP, a data recovery plan shall be implemented in coordination with any development activities.

5. A County-certified paleontologist/archeologist, shall monitor all grading operations on the Bolsa Chica Mesa and Huntington Mesa.

Grading activities shall also be monitored by a Native American monitor. If grading operations uncover paleontological/archeological resources, the paleontologist/archeologist and/or Native American monitor shall suspend all development activity to avoid destruction of resources until a determination can be made as to the significance of the paleontological/archeological resources. If found to be significant, the site(s) shall be tested and preserved until a recovery plan is completed to assure the protection of the paleontological/archeological resources.

2.2.14 Development - Conservation Planning Area Boundaries

Any Coastal Development Permit ***application or*** ~~and/or~~ Tentative Subdivision Map ***application*** for development abutting a Conservation Planning Area shall contain a Community Transition/Urban Edge Treatment Plan addressing the design of the interface between development and conservation uses in a manner consistent with the ~~Wetlands Restoration Program and the~~ Master Landscape Concept Plan ***and the certified LCP including Land Use Plan Policies 3.1.2.12, 6.2.16 and 6.2.17*** ~~contained in Bolsa Chica LUP~~. Documentation shall be provided either on the permit/map, or on an appropriate supplemental graphic/text, ~~and may be submitted in conjunction with an Area-wide Coastal Development Permit, as set forth in Section 10.3.2~~.

2.2.15 Public Infrastructure and Utilities Permitted

Public infrastructure and utility buildings, structures, and facilities including, but not limited to, electrical, gas, water, sewage, drainage, telephone, and cable television, and their storage, distribution, treatment, and/or production required to carry out development are permitted in all Planning Areas of the Planned Community, subject to a Coastal Development Permit approved pursuant to Orange County Zoning Code Section 7-9-118, "Coastal Development" District Regulations. Public infrastructure and utilities shall be located consistent with Chapter 6, Development Component, of the Bolsa Chica LUP.

Public infrastructure and utilities must also conform to the following regulations:

1. Consistent with sound civil engineering practices, public infrastructure and utilities shall be principally located in road rights-of-way or, where necessary and feasible, in recreation and open space areas not required for wildlife habitat.

2. Any public infrastructure or utilities located within recreation or open space areas shall be placed below grade to the maximum extent feasible. Where undergrounding is infeasible, utilities shall be designed in a manner which will not reduce useable recreation or parking area or be visually intrusive.

3. Public infrastructure and utilities shall not be located within ESHAs or wetlands or the Wetlands Ecosystem Area except to the extent the location of the utilities within a wetland constitutes an incidental public service and, in accordance with Coastal Act Section 30233(a)(5), there are no other feasible, less environmentally damaging alternatives. Mitigation measures shall be provided to minimize adverse environmental effects of any utilities located in these areas, including utilities directly related to petroleum production, wetland restoration and maintenance, water quality and flood control.

2.2.16 Fire Station Facility Agreement

Prior to recordation of any Final Tract Map (except a map for financing or conveyance purposes), the Landowner/Master Developer shall enter into a secured Fire Station Facility Agreement in a form acceptable to the Orange County Fire ~~Department~~ ***Authority*** and the County Administrative Office.

2.2.18 Water Quality Management Plan

~~If determined applicable by the Manager, Environmental Resources Division, prior to the recordation of any Final Tract Map (except a map for financing or conveyance purposes) or before the issuance of any Building Permit(s) for new construction, the Landowner/Master Developer shall submit a Water Quality Management Plan (WQMP) to the Manager, Subdivision Division, for review and approval. The WQMP shall identify specific source control measures (i.e., Best Management Practices or "BMPs") to be implemented to reduce the discharge of pollutants to storm water facilities during all phases of project development. These source reduction measures are articulated in the National Pollution Discharge Elimination System (NPDES) Permit No. CA 8000180. The WQMP shall also establish responsibilities for maintenance.~~

All new development, as defined in Section 30106 of the Coastal Act within the Bolsa Chica LCP area shall be designed and undertaken in compliance with applicable provisions of the State National Pollution Discharge Elimination System (NPDES) General Permit for Stormwater

Discharge Associated with Construction Activity issued by the State Water Resources Control Board (SWRCB), and any subsequent amendments or re-issuance of; the County's NPDES Municipal Stormwater Permit, issued to Orange County and Cities by the California Regional Water Quality Control Board, and any subsequent amendment to or re-issuance thereof; the Orange County Drainage Area Management Plan (OC DAMP); and the water quality and marine resource policies of the LCP.

As part of any coastal development application for development within the Bolsa Chica LCP area, the Landowner/Master Developer shall prepare a Water Quality Management Plan (WQMP). The WQMP shall be submitted prior to filing the coastal development permit application as complete. The WQMP shall be submitted to the Manager, Subdivision Division, and Grading Services for review and approval in consultation with the Manager, Environmental Resources or Stormwater Division.

The Plan shall be prepared in accordance with Orange County's Drainage Area Management Plan, and the Bolsa Chica Planned Community Program. The Plan shall be consistent with the water quality policies and other applicable resource management policies contained herein, and shall demonstrate that proposed development within the LCP area is in conformance with the development standards, pertaining to water quality, specified in the Water Quality Section of the LCP. The WQMP shall identify specific source and treatment control measures or Best Management Practices (BMPs) to be incorporated into the development, in order to minimize pollutant load generation, reduce nuisance flows commonly associated with urban development, and to minimize the volume, velocity and pollutant load of stormwater leaving the developed site. The WQMP shall contain provisions for long-term operation and maintenance of approved permanent Best Management Practices (BMPs), a monitoring program and a public education program to protect and improve water quality. The proposed BMPs, maintenance provisions and other elements of the WQMP shall be conditions of approval for coastal development permits in accordance with the procedural specifications in Chapter 2 of the LCP.

2.2.19 Hazardous Materials Assessment

~~Prior to the recordation of any subdivision map~~ ***At the time of submittal of any coastal development permit application for a subdivision*** that involves offers of dedication or grants of easement rights on one or more parcels to a

public agency, the subdivider shall prepare a Hazardous Materials Assessment over such parcel(s) in a manner acceptable to the Manager, Environmental Resources ~~Division~~.

2.2.20 Interim Land Uses Allowed

The following interim land uses are allowed within undeveloped areas of the Planned Community ***except that any interim uses within any area designated as Conservation, or Open Space and Recreation shall be consistent with the respective Conservation or Open Space and Recreation Planning Area Regulations of this Planned Community Program***:

2. County-approved infrastructure facilities necessary for the development of adjacent urban areas (e.g., roads, utility lines, water reservoirs, flood control facilities, utility access roads, erosion control devices and basins, etc.) ***Any such facility shall be consistent with all applicable LUP policies and the Public Facilities Regulations of this Planned Community Program***;

2.2.21 Temporary Uses Permitted

Special community events, such as environmental fairs, community picnics, trash clean-ups, grand openings, and other similar temporary uses and activities, may be permitted in any Planning Area of the Bolsa Chica Planned Community~~, subject to approval by the Director, EMA~~. ***Temporary uses which are incompatible with the uses allowed in Conservation or Open Space and Recreation areas shall be prohibited within those areas.***

2.2.23 Reduction of Traffic Congestion/Vehicle Trips

Where feasible, Project Coastal Development Permits shall incorporate the following specific measures.

1. **Education and Information:** A centrally-located commuter information area that offers information on available transportation alternatives, route schedules and maps, available employee incentives, and rideshare promotional material shall be provided in a community clubhouse~~ and for Neighborhood Commercial areas~~.

2. **Telecommunications:** A telecommunications center shall be developed within the Planned Community. This center could be located within a community clubhouse ~~or Neighborhood Commercial area,~~ and include Automatic Teller Machines (ATM), Modem/Fax stations, Teleservice facilities, government information and/or transaction machines, and other related communication facilities which eliminate the necessity of physical travel outside the Planned Community.

3. **Bicycle Parking:** Bicycle commuting shall be encouraged through the inclusion of amenities that address unique aspects of the bicycle commuter, including Class I and Class II Bicycle Trails and the provision of safe and secure bicycle racks within the ~~Neighborhood Commercial and~~ community park areas of Bolsa Chica.

2.2.25. Opens Space Deed Restrictions and Dedications

All open space, public access/trails, park dedications, and conservation easements shall be recorded, and where applicable improved, in accordance with the requirements of the Bolsa Chica Local Coastal Program. Any deviations shall require a Local Coastal Program Amendment.

2.3 CONDITIONS OF APPROVAL

2.3.3 Light and Glare

3. Prior to issuance of any building permits within tracts abutting wetlands, environmental sensitive habitats or open space buffer areas, the applicant shall demonstrate that all exterior lighting has been designed and located so that all direct rays are confined to the property in a manner meeting the approval of the Manager, Building Permit~~s~~ ***Services***.

2.3.4 Noise

4. Prior to the issuance of any grading permits, the project proponent shall produce evidence acceptable to the Manager, Building Permit~~s~~ ***Services*** that:

2.3.5 Annual Monitoring Report

5. An Annual Monitoring Report (AMR) shall be prepared and submitted ***by July 1st of*** each year by the landowner to the County Administrative Office, Policy Research and Planning, and the Environmental ~~Management Agency~~ ***and Project Planning***~~/Advance Planning~~ Division. The submittal of an AMR for the planned community is required for conformance with the Growth Management Program of the Land Use Element of the Orange County General Plan and the County's annual Development Monitoring Program (DMP).

   The Board of Supervisors, in the annual adoption of the Development Monitoring Program, may identify a significant imbalance between proposed development and planned infrastructure~~ or in the proportionate development of residential, commercial, and employment land uses~~. The Board of Supervisors may then defer subdivision approval within the Planned Community until approaches capable of resolving imbalances are proposed and approved by the Board of Supervisors. ***Any proposed changes to the standards and policies of the certified LCP shall require that an LCPA be certified by the Commission.*** The AMR will be the landowner's opportunity to demonstrate ***that*** mitigation measures and implementation strategies ~~which~~ shall ensure adequate infrastructure for the Planned Community.

6. Prior to submission of a petition or a resolution of application for annexation of the ~~subject~~ property ***governed by the certified LCP*** to a city, or prior to consent by the landowner to annexation by a city, the landowner shall obtain the approval from Director, ~~EMA~~ ***PDSD*** of a revised Fiscal Impact Report to assess the cost-revenue impact of such annexation on the County and the special districts serving the property to be annexed with adequate provision made to mitigate any negative impact to the General Fund that has occurred during buildout of the project.

7. Prior to the recordation of any final tract map (except for financing purposes), CCRs or other methods, including the establishment of a

property owners association or other entity which will guarantee the provision at no cost to the County of any extended services and any private services required, shall be submitted to and approved by the Director, ~~EMA~~ ***PDSD*** and County Counsel, and shall then be recorded prior to the issuance of any certificates of use and occupancy.

~~8. Prior to the issuance of each building permit for Mesa construction, the applicant shall pay a fee of $2,800 per dwelling unit. These fees will be deposited into a "Mesa Conservation Fund" established by the County. The funds will be used for construction, restoration, operations and maintenance of Wetland Restoration Area 1C and/or other areas within the Recreation/Open Space or Wetlands Restoration Program. All funds collected in the Mesa Conservation Fund may be credited toward a $7 million applicant obligation referenced under Table D-1 in a proposed Development Agreement if said Agreement is executed by the Board of Supervisors. The fee of $2,800 per dwelling unit shall be subject to an annual inflationary factor as described in the Southern California Real Estate Research Council Construction Cost Index. Adjustments to the fees should occur on January 1 of every year based on the previous four quarters' inflation.~~

~~9. Prior to the issuance of any grading permit (except for seismic testing) or building permit in the Bolsa Chica lowland the applicant will establish a financing mechanism, with the exception of a public financing district, for the purpose of funding the construction, restoration, operation and maintenance of all wetlands, ESHAs, buffers, a non-navigable tidal inlet and a kayak/canoe facility or other wetland restoration facilities identified in the Bolsa Chica Local Coastal Program. Evidence shall be provided to the Director, EMA, that such a mechanism has been established.~~

2.3.6 Grading/Geology/Soils

10. ~~Prior to the issuance of any grading permit~~ ***Consistent with Section 2.2.12, as part of the submittal of any coastal development permit application for grading***, the developer shall submit a soils engineering and geologic study to the ~~Manager, EMA Development Services Division~~ ***Manager, Subdivision and Grading Services***~~, for approval~~. The report shall include the information ***identified in Section 2.2.12*** and be in a form as required by the Orange County Grading Manual. At the discretion of the ~~Manager, EMA Development Services Division~~ ***Manager, Subdivision and Grading Services*** the report may require review by the Grading Technical Advisory Board (appointed by the Board of Supervisors). This report shall include assessment of potential soil-related constraints and hazards such as slope instability, settlement, seismic shaking, liquefaction, landslides, compressible materials, rippability related secondary seismic impacts or any other areas of inquiry determined to be appropriate by the ~~Manager, EMA Development Services Division~~ ***Manager, Subdivision and Grading Services***. The report also shall include evaluation of potentially expansive soil, recommended construction procedures, and shall evaluate design criteria for a 9-million gallon reservoir, sewage and utility lines proximate to or crossing over identified fault lines.~~ For Lowland residential grading permits only, the report shall also include design criteria for deep dynamic compaction and groundwater drainage cutoff wall associated with such lowland development.~~ The report shall demonstrate compliance with the applicable provisions of the Alquist-Priolo Act and shall denote precise boundaries for Alquist-Priolo Special Studies Zone for the exclusion of habitable structures. ***All coastal development permits for grading shall require that evidence be provided prior to issuance of any coastal development permit for the proposed grading that all necessary geologic and soil recommendations have been incorporated into all building and grading plans.***

2.3.7 Hazardous Substances

11. Prior to the issuance of any grading permit or introduction of tidal influence, an applicable Remedial Action Plan (RAP) shall be provided by the applicant subject to the approval of the ~~Manager, EMA Environmental Resources Division~~ ***Manager, Environmental Resources*** for cleanup of contamination that is found to exist on the site. The need for redemption of any existing conditions shall be determined based on a Health Risk Assessment (for the areas proposed for wetlands restoration).

12. ~~Prior to the recordation of any final~~ ***As a part of any coastal development permit application for the approval of any subdivision and prior to the*** ~~parcel/tract map or~~ issuance of any ***coastal development,*** grading or building permit, whichever occurs first, the applicant shall provide, in accordance with criteria supplied by ~~EMA~~ ***PFRD***, a Hazardous Materials Assessment and Disclosure Statement covering the property (both fee and easement) which will offered for dedication or dedicated to the County of Orange. This document shall be offered to the County of Orange for review and approval by the ~~Manager, Development Services~~ ***Manager, Subdivision and Grading Services*** in consultation with the Manager, Environmental Resources.

~~13. Prior to the issuance of any grading permit, the applicant shall provide to the Manager, Environmental Resources Division, in coordination with oil field operators, any necessary amendment to the Oil Spill Prevention Control and Countermeasure Plan (OSPCCP) and Oil Spill Contingency Plan (OSCP) enacted between the oil field operators and appropriate state agencies to prevent the oil spill and ensure the compatibility between oilfield and proposed residential, wetlands and other developments.~~

~~14. Prior to the issuance of any grading permit in the lowland, the applicant shall provide a plan for the installation of berms and dikes around the tidally or flood influenced areas subject to the approval of Manager, EMA Flood program Planning Division to prevent potential Oil Spill to wetlands and lowland development.~~

16. ***As part of any coastal development permit application for residential development adjacent to oil operations,*** ~~Prior to the issuance of any Coastal Development permit or recordation of any tract/parcel map for residential units, whichever occurs first,~~ the applicant shall provide evidence to the ~~Manager, EMA Development Services~~ ***Manager, Subdivision and Grading Services*** in consultation with the ~~Manager, EMA Environmental Resources Division~~ ***Manager, Environmental Resources*** that all proposed residential units are set back at least fifty (50) feet from operating wells, ten (10) feet from abandoned oil wells and twenty (20) feet from any underground pressurized gas line.

17. ***As part of any coastal development permit application for subdivision and prior to the approval*** ~~Prior to the issuance~~ of any ~~grading~~ ***coastal development*** permit ***for grading adjacent to oil operations***, a ~~Grading Mitigation Plan~~ grading mitigation plan shall be

provided by the applicant to the Manager, EMA Development Services Division ***Manager, Subdivision and Grading Services***. The Grading Mitigation Plan shall include the locations of all active, inactive, and abandoned oil wells and pipelines within the area of proposed grading, along with measures to be taken to protect these facilities from disturbance during grading and site development activities. Active oil facilities shall be protected by fences and/or appropriate berm during grading and site development activities; inactive or abandoned pipelines shall be removed prior to grading and site development activities; and abandoned oil wells shall be relocated and tested for release of gases or re-abandoned in accordance with current California Department of Oil and Gas (CDOG) regulations. The grading mitigation plan shall include the location of any known soil contamination within the area. If contaminated soil is to be or likely to be disturbed during the grading or site development activities, the Grading Mitigation Plan shall include a plan for remediation of the contaminated soil. The Grading Mitigation Plan shall also provide details of the steps to be taken if unexpected conditions are encountered during grading or site development, such as additional pipelines, abandoned wells, or soil contamination.

18. ***As part of any coastal development permit application for development adjacent to a gas line and prior to the approval*** ~~Prior to the issuance~~ of any ***coastal development for*** grading ~~permit or recordation of any tract/parcel map whichever occurs first~~, the applicant shall provide evidence subject to the approval of ~~Manager, EMA Development Services Division~~ ***Manager, Subdivision and Grading Services,*** that the pressurized gas line shall be relocated so that: (1) it does not cross the Newport-Inglewood Fault zone in a residential planning area; and (2) automatic shut-off valves shall be installed which activate in the event of severe seismic movement.

2.3.8 Surface and Groundwater Hydrology

~~19. Prior to the issuance of any grading permit in the lowlands, the applicant shall consult with Manager, EMA Flood Program Division or his designee to ensure that no grading activities in the lowlands will take place before the completion of the appropriate Santa Ana River Mainstem project phases to remove the project area from the Santa Ana River floodplain without providing appropriate mitigation subject to the approval of the Manager, EMA Development Services in consultation with the Manager, EMA Flood Program. (PDF-1)~~

20. ~~Prior to the issuance of any grading permit in the lowlands, if the Santa Ana River floodplain within the project limits is not removed as a consequence of the County/Federal Government funded Santa Ana River Project (SARP) at the time of grading for proposed buildings, structures, and residential developments within the existing Santa Ana River floodplain, appropriate mitigation measures, including the filing of FEMA Elevation Certificate, shall be provided by the applicant for each building site, residence, or structure demonstrating that as-built lowest floor elevations are at least 1 foot above the 100-year flood elevation in a manner meeting the approval of Manager, EMA Development Services. (Mitigation 4.4-8)~~

    ~~To the extent required by CEQA, these mitigation measures shall be developed through a supplemental and focused environmental review under CEQA. As appropriate, proposed buildings, structures, and residential development shall also be mitigated from flooding from any known residual floodplain (i.e., other than the Santa Ana River) in a manner meeting the approval of Manager, EMA-Development Services or the appropriate official from the applicable local jurisdiction, before any grading permits are issued for proposed buildings, structures, and residences within areas delineated as residual floodplains.~~

    ~~If residual floodplains continue to remain on FEMA's Flood Insurance Rate Maps (FIRM) after the Santa Ana River Floodplain is removed, an Elevation Certificate demonstrating that as-built lowest floors are at least 1 foot above the 100-year elevation of the residual floodplain shall be submitted, or, a Conditional Letter of Map Revision (CLOMR) from FEMA revising the FIRM shall be obtained, as appropriate, prior to the issuance of any building permit, in a manner meeting the approval of Manager, EMA-Development Services.~~

    A Letter of Map Revision (LOMR) shall be received ~~by the applicant/developer~~ from FEMA, in a manner meeting the approval of

~~Manager, EMA-Development Services~~ ***Manager, Subdivision and Grading Services*** or of the appropriate official from the applicable local jurisdiction, prior to receiving Use and Occupancy Certifications for any ~~buildings,~~ structures~~, and residences~~ within floodplains.

To the extent required by CEQA, these mitigation measures will be developed through a supplemental focused environmental review. (Mitigation 4.4-8)

~~21. Prior to the issuance of any grading permits for residential units for lowland parcels in Bolsa Chica LCP/LUP Planning Areas 10 and 11, the applicant shall design and construct the EGGW Channel within the Project Area to Graham Avenue Bridge including the removal and reconstruction of tidegates in accordance with OCFCD's criteria and standards to be capable of conveying EMA approved 100-year discharges in a manner meeting the approval of Manager, EMA-Development Services.~~

~~22. Prior to the issuance of any grading permits for residential units for lowland areas in Bolsa Chica LCP/LUP Planning Area 9, the developer/applicant shall obtain an Elevation Certificate demonstrating that building site pads are at least one foot above any residual floodplain from the EGGW Channel all in a manner meeting the approval of the Manager, EMA Development Services.~~

~~23. Prior to issuance of any grading permit within any tidally or flood influenced area, the applicant shall provide an evaluation to the Manager, EMA Flood Program on the potential occurrence of natural near-surface groundwater and artificially induced groundwater to determine the potential of shallow groundwater recharge to adjacent residential area caused by the wetlands restoration. Studies shall include, but shall not be limited to, subdrains, impermeable soil caps on finish grade, subsurface barriers such as cutoff walls or interceptor drains, or French Drains with dewatering wells. (Mitigation 4.4-1)~~

~~24. Prior to issuance of any grading permit in full or muted Wetland Restoration Planning areas adjacent to Bolsa Chica Mesa or EGGW Flood Control Channel, the applicant shall provide to the approval of Manager, EMA Development Services a detailed geotechnical study that evaluates the impact of saltwater intrusion into the upper Pleistocene Alpha and Beta Aquifers, and provides recommendations to prevent the degradation of groundwater due to tidal inundation if either a full tidal or muted tidal area is constructed in the Bolsa Pocket. The report shall include, but not be limited to, impermeable soil caps and subsurface barriers. (Mitigation 4.4-2)~~

~~25. Prior to the issuance of any grading permit in the lowland adjacent to existing residences, the applicant shall provide a detailed geotechnical study to evaluate transmissivity and other hydrogeologic characteristics in the Edwards Thumb area and the Lowland near the existing residential neighborhood in order to evaluate the impacts of irrigation and impounded water on groundwater levels in the existing residential neighborhood and provide appropriate mitigation measures to assure that no significant adverse impacts will result from changes in groundwater level in a manner meeting the approval of Manager, EMA Development Services Division. Such an investigation shall include but not be limited to the installation of monitoring wells and the performance of pump test for data collection with the following potential mitigation measures: subsurface cutoff wall, subsurface drains, and French Drains. (Mitigation 4.4-3)~~

~~26. Prior to issuance of grading permits for any lowland residential development that impact the Bolsa Chica pump station, the applicant shall provide a design and construction schedule by a licensed civil engineer to reroute the Bolsa Chica pump station discharge water without disruption in a manner meeting the approval of Manager, EMA Development Services. (Mitigation 4.4-4)~~

2.3.9 Water Quality

~~27. Prior to the issuance of any grading permit in lowlands, the applicant shall provide a program of maintenance dredging near the mouth of the EGGW Channel to remove sediment, resulting from urban runoff, that may contain unacceptable concentrations of pollutants in a manner meeting the approval of Manager, EMA Flood Program. (PDF-4)~~

28. ~~Prior to the issuance of any grading permit in the lowlands the applicant shall prepare to the satisfaction of Manager, EMA Environmental Resources Division, appropriate measures including but not limited to the use of turbidity barriers, silt curtains or an equivalent measure to contain turbidity in localized areas to be incorporated by the applicant during dredging or wetland restoration activities. (PDF-5)~~

All development, as defined in Section 30106 of the Coastal Act, within the Bolsa Chica LCP area shall be designed and undertaken in compliance with applicable provisions of the State National Pollution Discharge Elimination System (NPDES) General Permit for Stormwater Discharge Associated with Construction Activity issued by the State Water Resources Control Board (SWRCB), and

any subsequent amendments or re-issuance of; the County's NPDES Municipal Stormwater Permit, issued to Orange County and Cities by the California Regional Water Quality Control Board, and any subsequent amendment to or re-issuance thereof; the Orange County Drainage Area Management Plan (OC DAMP); and the water quality and marine resource policies of the LCP.

29. ~~Prior~~ ***As part of any coastal development permit application for and prior*** to the issuance of any ***coastal development permit which includes*** grading ***and/or construction, including development of backbone infrastructure,*** ~~permit~~ the project applicant shall obtain ***coverage under the*** ~~a~~ State General Construction Activity ***NPDES*** Stormwater Permit***,*** ~~from~~ ***administered by*** the State Water Resources ***Control*** Board ***(SWRCB)*** and provide evidence to this effect to the ~~Manager, EMA Development Services Division~~ ***Manager, Subdivision and Grading Services and, the Manager, EMA, or Stormwater Division***. As part ~~of this permit~~ ***of any coastal development permit application for, and prior to the issuance of any coastal development permit which includes grading and/or construction, including development of backbone infrastructure,*** the applicant shall ~~prepare~~ ***submit*** a Stormwater Pollution Prevention Plan (SWPPP), ***prepared by an appropriate licensed professional. The plan shall be in conformance with the SWRCB NPDES Permit regulations, and be available on-site throughout construction activities.*** ~~which~~ ***The Plan*** shall ~~establish~~ ***identify*** Best Management Practices (BMPs) for: proper storage, handling, use, and disposal of fuels and other toxic materials; establishing fuel and maintenance areas away from drainage ways; and erosion, sediment and construction site chemical ~~contracts,~~ ***control*** including those measures recommended by ~~EMA~~ ***the U.S. Environmental Protection Agency (USEPA), in the*** document "~~Evidence~~ ***Guidance*** Specifying Management Measures for ~~Services of Non/paint~~ ***Nonpoint Source*** Pollution in Coastal Waters" ~~(1993)~~***, and in the California Stormwater Handbook – Construction Manual (1993)***.

a. Any coastal development permit that is approved shall require that qualified personnel conduct inspections of the construction site prior to anticipated storm events, during extended storm events, and after actual storm events to identify areas contributing to a discharge of stormwater associated with construction activity. Pre-storm events are to ensure that BMPs are properly installed and maintained; post-storm events are to assure that the BMPs have functioned adequately. During

extended storm events, inspections are required each 24-hour period. The coastal development permit shall require that BMPs be evaluated for adequacy and proper implementation.

b. Inspections conducted in accordance with the Permit, shall be recorded. These records shall be certified by the discharger or qualified designated personnel, as being conducted in compliance with the terms of the coastal development permit, and submitted to the permitting agency. The certified records shall be submitted on a monthly basis during the rainy season (October 1st – April 30th) each year that construction or grading operations are underway.

c. If based on verification of these records by the permitting agency, it is determined that the discharger is not in compliance with the terms of the coastal development permit, corrective actions shall be required.

d. ***If corrective actions constitute development under Section 30106 of the Coastal Act, the proposed corrective measures shall require an amendment to the coastal development permit issued by the permitting agency.***

30. ~~Prior to the recordation of any final parcel/tract map or issuance of~~ ***As part of*** any ***coastal development permit application which includes*** grading ***and/***or ~~building permit~~ ***construction, including development of backbone infrastructure,*** (including permits for tract improvements),~~. Whichever occurs first,~~ the ~~project applicant~~ ***landowner/master developer*** shall submit a Water Quality Management Plan (WQMP) ***prepared for the development*** to the ~~Manager, EMA Development Services Division~~ ***Manager, Subdivision and Grading Services*** for ***review and*** approval in consultation with the Manager, ~~EMA~~ Environmental Resources. ***The WQMP shall be submitted prior to filing the coastal development permit application as complete.*** ~~The WQMP may include the use of trash racks and grease and oil separators or measures equivalent in pollutant removal effectiveness to improve the quality of urban runoff, and other BMPs to improve the quality of runoff from the development. Since pollutant removal effectiveness is the basis for BMP incorporation, no storm drain from the project shall discharge into any portion of Bolsa Bay, the East Garden Grove Wintersburg Channel, or the restored wetlands without full BMP incorporation on that drain. Subsequent, site specific WQMPs may be required as further land use and/or development details become known.~~

The Plan shall be prepared in accordance with Orange County's Drainage Area Management Plan, and the Bolsa Chica Local

Coastal Program. The Plan shall be consistent with the water quality policies and other applicable resource management policies contained herein, and shall demonstrate that proposed development within the LCP area is in conformance with the development standards, pertaining to water quality, specified herein. Based on the development standards specified herein, the WQMP shall identify specific source and treatment control measures or Best Management Practices (BMPs) to be incorporated into the development, in order to minimize pollutant load generation, reduce nuisance flows commonly associated with urban development, and to minimize the volume, velocity and pollutant load of stormwater leaving the developed site. The WQMP shall contain provisions for long-term operation and maintenance of approved permanent Best Management Practices (BMPs), a monitoring program and a public education program to protect and improve water quality. The BMPs, maintenance provisions, monitoring plan and other elements of the WQMP shall be conditions of approval for coastal development permits, in accordance with the procedures described herein.

The WQMP shall include provisions for long-term maintenance of all approved structural and non-structural BMPs, including identification of a funding mechanism for such maintenance. Maintenance requirements shall be recorded on the property deed, and will be the responsibility of the landowner/or successor in interest. Maintenance specifications are as follows: all approved BMPs shall be maintained in a functional condition throughout the life of the approved development. Maintenance activity shall be performed according to recommended maintenance specifications contained in the California Stormwater BMP Handbooks (California Stormwater Quality Task Force, 1993) for selected BMPs. At a minimum, maintenance shall include the following:

a. All structural BMPs shall be inspected, cleaned and repaired, as needed prior to the onset of the storm season, no later than October 1st of each year and following the first rainfall event (> 0.5 inches) of each storm season

b. For the first storm season following the issuance of the Certificate of Occupancy, all structural BMPs shall be inspected regularly (a minimum of once a month) throughout the rainy

season (October 1st-April 30th) to ensure the BMPs are functioning properly as installed and

c. Should any of the project's surface or subsurface drainage/filtration structures or other BMPs fail or result in increased erosion, the applicant/landowner or successor-in-interest shall be responsible for any necessary repairs to the drainage/filtration system and restoration of the eroded area. Should repairs or restoration become necessary, prior to the commencement of such repair or restoration work, the applicant shall submit a repair and restoration plan to the County Planning Department, to determine if an amendment or new coastal development permit is required to authorize such work.

The approved WQMP shall be implemented prior to, or in conjunction with the approved development. The approved BMPs and other measures included in the final WQMP must be in place and functional prior to issuance of the Certificate of Occupancy for the approved development.

Consistent with the above, the following specific development standards shall be applied to development types listed below. These measures shall be included in WQMP(s), when required, in accordance with the procedures described above:

GRADING AND/OR BACKBONE INFRASTRUCTURE STANDARDS: Coastal development permits which include grading, and/or construction, including any backbone infrastructure improvement to accommodate the build-out of residential units and/or ancillary facilities shall include provisions to ensure compliance with all of the following:

a. Post-development peak runoff rates and average volume from the developed site shall not exceed pre-development levels for the 2-year 24-hour storm runoff event.

b. Approved development shall reduce the post-development loadings of Total Suspended Solids (TSS) so that the average annual TSS loadings are no greater than pre-development loadings; or if this is not feasible, after construction has been completed and the site is permanently stabilized, approved development shall reduce the average annual TSS loadings by

80% (for the purposes of this measure, an 80% TSS reduction is to be determined on an average annual basis and shall not result in TSS lower than the pre-development level).

c. Where new storm drain outlets are necessary, discharge points shall be sited and designed to release in the least environmentally sensitive location and manner.

i. Storm drains are prohibited from discharging directly into Outer Bolsa Bay, the Bolsa Chica Ecological Reserve, Warner Pond or the lowland wetlands restoration area.

ii. The discharge (in terms of both volume and water quality) of stormwater into other wetlands or ESHAs, other than those specified in subsection (a) above, shall only be allowed if necessary to maintain or enhance the functional capacity of the receiving wetland or ESHA.

iii. Energy dissipater devices shall be installed on all approved storm drain outlets to prevent erosion and scour at base.

d. Source and treatment control measures such as structural and non-structural Best Management Practices (BMPs) designed to control the volume, velocity and pollutant load of stormwater and nuisance runoff leaving the developed site shall be incorporated into the development.

e. BMPs shall be selected based on efficacy at mitigating pollutants of concern. Pollutants of concern associated with residential development include nutrients, organophoshpates, chemicals, petroleum hydrocarbons, and animal waste generated bacterium.

f. Permanent post-construction treatment control BMPs (or suites of BMPs)shall be designed to mitigate (infiltrate, filter or treat) storm water runoff from each storm runoff event up to and including the 85th percentile, 24-hour runoff event, for volume-based BMPs, and/or the 85th percentile, 1-hour runoff event, with an appropriate safety factor, for flow-based BMPs.

g. Dry weather (April 30th through October 1st of any year) nuisance flows shall be diverted to flow into the local wastewater treatment facility, or other suitable treatment/reclamation facility for treatment prior to discharge.

h. A homeowners educational program aimed at raising awareness about the water quality impacts of urban runoff, and which provides information about good housekeeping practices for homeowners to prevent and minimize polluted runoff will be the responsibility of the landowner/master developer to develop and implement. This may include signage at appropriate community center areas such as…arrangement for delivery of homeowner educational brochures/material, and stenciling of all storm drain inlets with "no dumping – drains to ocean" or other appropriate local insignia.

h. A post-construction water quality monitoring plan designed to evaluate the efficacy of the required BMPs in mitigating pollutants and controlling runoff volume shall be prepared by a qualified professional with expertise in water quality monitoring, and will be the responsibility of the landowner /master developer to implement. The plan shall include provisions for :

i. A sampling approach which will involve data collection of stormwater from a minimum of 3 representative storm events annually, using a flow –weighted composite sampling approach. Monitoring shall be conducted for a period of 5 years beginning at the time the Certificate of Occupancy is issued for the development

ii. Samples shall be taken of stormwater runoff from the developed site at all stormwater discharge points (samples shall consist of 100% runoff, e.g. must be taken at a point before discharge enters receiving water body)

iii. Samples shall be analyzed for constituents commonly associated with proposed land use, including but not limited to the following: Total Suspended Solids, Nutrients (Nitrates and Phosphates), Trace Elements (Zinc, Copper, Cadmium), Human Pathogens (using indicator bacteria - Total Coliform, Fecal Coliform and Enterococcus).

iv. Analysis shall compare data results with predicted pollutant concentrations and overall loadings, based on the water quality modeling analysis of the Mesa development, conducted by PBS&J, using the EPA method or "Simple Method" as submitted in October of 2000. Additionally, analysis shall compare data results with relevant constituent limitations for effluent in receiving water bodies (EGGWC and Outer Bolsa Bay or other receiving waters) and with Water Quality Objectives (WQOs) associated with the East Garden Grove Wintersburg Channel, Outer Bolsa Bay or any other receiving waters.

v. Reports containing data and analysis shall be submitted to the permitting agency, prior to June 30th each year for the duration of the monitoring program.

vi. If, based on review and consultation between the permitting agency, and the Regional Water Quality Control Board, in consideration of the analytical parameters set forth in 8(d), monitoring results indicate pollutant levels of sampled constituents are significantly higher than predicted and/or are causing or contributing to significant adverse impacts in receiving waters, an investigation of the cause or source of the pollutants shall be undertaken by the landowner / master developer. If the cause of the high pollutant levels is determined to be inadequate or faulty BMPs, additional BMPs, or corrective actions shall be required.

vii. If corrective actions, or additional BMPs constitute development under Section 30106 of the Coastal Act, the proposed corrective measures shall require an amendment to the coastal development permit issued by the permitting agency.

RESIDENTIAL DEVELOPMENT – BUILDING AND SITE DESIGN STANDARDS: Coastal development permits which include construction and build-out of residential homes and/or ancillary structures and/or common area landscaping shall comply with all of the following:

a. Site plans shall be designed to maximize the percentage of permeable surface and green space within the development to allow more percolation into the ground where suitable conditions exist or design site with the capacity to convey or store peak runoff from a storm and release it at a slow rate so as to minimize the peak discharge into storm drains or receiving water bodies.

b. Use porous materials for or near walkways where feasible; incorporate design elements which will serve to reduce directly connected impervious area. Options include the use of alternative design features such as concrete grid or modular driveways, pavers for walkways, or center line driveway grassy swales

c. To the maximum extent feasible, rooftop runoff from structures should be directed to infiltration trenches or vegetative swales prior to being conveyed off site in a non-erosive manner.

d. For common area landscaping, selected vegetation should consist primarily of drought tolerant native or adapted plant material in order to minimize the need for fertilizer, pesticides, and excessive irrigation. Where irrigation is necessary, the system must be designed with efficient technology, such as drip irrigation. At a minimum the following requirements apply:

i. all irrigation systems shall have flow sensors and master valves installed on the mainline pipe to ensure system shutdown in the case of pipe breakage.

ii. Irrigation master systems shall have an automatic irrigation controller to ensure efficient water distribution.

iii. Automatic irrigation controllers shall be easily adjustable so that site watering will be appropriate for daily site weather conditions.

iv. Automatic irrigation controllers shall have rain shutoff devices in order to prevent unnecessary operation on rainy days.

PARKING LOTS: Coastal development permits which include the development of a parking lot with 25 or more spaces shall:

a. Incorporate structural or non-structural BMPs effective at mitigating pollutants of concern such as petroleum hydrocarbons and heavy metals, trash and debris; and

b. Include provisions for having the parking lot vacuum swept on a regular basis (monthly during dry-weather – weekly during the rainy season (October 1st – April 30th) ; and

c. Design permanent post-construction treatment control BMPs (or suites of BMPs) to mitigate (infiltrate, filter or treat) storm water runoff from each storm runoff event up to and including the 85th percentile, 24-hour runoff event, for volume-based BMPs, and/or the 85th percentile, 1-hour runoff event, with an appropriate safety factor, for flow-based BMPs.

31. ***As part of any coastal development permit application for and prior*** ~~Prior~~ to issuance of any well permit from Orange County Health Care Agency (OCHCA), the project applicant shall prepare a work plan for well installation and operations which includes well construction details and pumping schedules in a manner meeting the approval of the State ~~Regional~~ Water ~~Quality~~ ***Resources*** Control Board ***(SWRCB),*** ~~(RWQCB),~~ the Orange County Water District (OCWD) and OCHCA. (SC-4)

32. ~~Prior to the recordation of a final tract/parcel map, or~~ ***and*** ~~prior to the issuance~~ ***As part*** of any ***coastal development permit application which includes*** grading ~~permits, whichever comes first,~~ ***and/or construction, including backbone infrastructure improvements,*** the following drainage studies shall be submitted to ~~and approved by~~ the ~~Manager, Development Services~~ ***Manager, Subdivision and Grading Services. The drainage studies shall be submitted prior to filing the coastal development permit application as complete. The drainage studies shall be reviewed by the Manager, Sub-division and Grading Services, in consultation with the Manager, Environmental Management Agency, and shall include all of the following***:

- A drainage study of the ~~subdivision~~ ***project site***, including ***proposed*** diversions, off-site areas that drain onto and/or through the subdivision, and justification of any ***proposed*** diversions; and
- ***A study documenting the natural drainage patterns in the Conservation and Open Space Areas, and evidence demonstrating the proposed drainage plans will not significantly alter the natural drainage patterns (development shall not cause an increase or decrease in mean flow for dry-weather or wet weather conditions as measured from a full range of storm events, e.g. 2-year 24-hour***

to the 100 year) and physical features associated with those patterns in those areas.

- When applicable, a drainage study evidencing that proposed drainage patterns will not overload existing storm drains; and
- Detailed drainage studies indicating how the tract map grading, in conjunction with the drainage conveyance systems, including applicable swales, channels, street flows, catch basins, storm drains, and flood water retarding, will allow building pads to be safe from inundation from rainfall runoff which may be expected from all storms to up and including the theoretical 100-year flood.

33. ~~Prior to the issuance of any grading permit, the applicant shall submit for approval by Manager, EMA Development Services an erosion control plan which shall include, but not be limited to~~:

Prior to the issuance of any coastal development permit for grading, the applicant shall submit for approval by the Manager, Subdivision and Grading Services in consultation with the Manager, Environmental Management Agency an erosion and sediment control plan which shall include temporary and permanent erosion control measures which shall be implemented in order to control erosion during the construction phase, and post-development. Sediment basins, debris basins, de-silting basins, or silt-traps shall be installed in conjunction with initial grading operations, and shall be maintained throughout their intended lifetimes to control erosion, and remove sediment from surface runoff. The prepared erosion and sediment control plan shall also include, but not be limited to:

- The name and 24-hour telephone number of the person responsible for performing emergency erosion control work.
- The signature of the civil engineer or other qualified individual who prepared the grading plan and who is responsible for inspection and monitoring of the erosion control work.
- All desilting and erosion protection facilities necessary to protect ***coastal resources,*** adjacent property***, and public infrastructure*** from sediment deposition.
- The streets and drainage devices that will be completed and paved by October 15 of each year.
- The placement of sandbags or gravelbags, slope planting ***, geotextile fabric, spray tackifiers,*** or other measures to control erosion from all ***exposed*** slopes ~~above and adjacent to roads open to the public~~. Use of gravelbags are encouraged over sandbags.

- The plan shall indicate how access will be provided to maintain desilting facilities during wet weather. (SC-5)
- ***Temporary and permanent erosion control BMPs shall be designed and installed in accordance with specifications contained in the California Stormwater BMP Handbook – Construction (1993).***

2.3.10 Coastal Resources

~~34. Prior to the recordation of any tract map for lowland residential units or this issuance of any building permits in Planning Areas 10 and 11 of the Bolsa Chica LCP Land Use Plan, the applicant shall implement construction of or bond, consistent with financing mechanisms required under Condition No. 9, for full improvements of the Bolsa Chica LCP Wetland Restoration Program including construction, restoration, operation and maintenance of all wetlands, ESHAs, buffers, non-navigable tidal inlet and kayak/canoe facility identified in the Bolsa Chica LCP in a manner meeting the approval of the Director, EMA in consultation with the Directors EMA Planning, EMA Harbors, Beaches and Parks, EMA Regulations and EMA Public Works.~~

~~35. Prior to the issuance of any grading permit in the lowland, the applicant shall satisfy the following conditions regarding a non-navigable ocean inlet facility subject to the approval of Manager, EMA Development Services Division in consultation with Manager, EMA Flood Program Planning Division:~~

~~a. Demonstrate that the tidal inlet will in addition to serving as a source of ocean water for the Wetland Restoration Program, be capable of conveying the EMA approved 100-year discharge from EGGW Channel to the ocean.~~

~~b. Prepare Monitoring and Maintenance Plan for sand management within the Wetland Restoration Plan area, at the inlet and adjacent beach area with appropriate cost analyses.~~

~~c. Provide a secured annuity or other financial assurance that guarantees that increased costs will not accrue to Orange County Flood Control District or the County of Orange as a consequence of the ocean outlet.~~

~~d. Revetments shall be provided by the applicant for an appropriate distance north and south of the tidal inlet to protect Pacific Coast Highway and existing Bolsa Chica State Beach parking areas.~~

~~e. Provide any other study, design documentation, engineering analysis or calculation, hydrologic evaluation or project assurance deemed appropriate by the Manager, EMA Development Services regarding a tidal inlet or supporting or affected facilities.~~

2.3.11 Marine/Aquatic Biology

~~36. Prior to the issuance of any grading permit in lowland, the applicant shall submit a Wetlands Restoration Plan (WRP) for the approval of Manager, EMA Environmental Planning Division in consultation with Manager, EMA Project Planning Division and Manager, EMA Coastal Facilities. The WRP shall contain a Conservation Monitoring and Maintenance Plan consisting of three separate plans; Construction Monitoring and Maintenance, Post Five Year Monitoring and Maintenance; and a Long Term Monitoring Plan. The Conservation Monitoring and Maintenance Plans shall contain Water Quality Performance Standards and Safeguards, ensure protection of the habitats during construction, monitor each phase for 5 years post construction and correct any deficiencies in the habitat, and finally, monitor the restored habitats for the long term. The Conservation Monitoring and Maintenance Plan shall also incorporate a program of systematic debris removal maintenance for the restored wetlands. (PDF-6)~~

2.3.12 Terrestrial Biology

~~37. Prior to the issuance of any grading permit in the lowland, the project applicant shall provide financial security for the approval of Manager, EMA Environmental Planning Division in consultation with Manager, EMA Project Planning and Manager. EMA Coastal Facilities to ensure that the approved Wetlands Restoration Plan be fully implemented to satisfy, but not limited to Construction Monitoring & Maintenance as described in the WRP, and Five-Year Post-Construction Monitoring and Maintenance, Long-Term Monitoring and Maintenance, 20 acres of native woodland habitat, in the Harriet Wieder Regional Park, a plan to control the presence of invasive and/or feral pets into wildlife areas, retention of a minimum of 200 acres of pickleweed on-site during all construction and restoration phases, and all other terrestrial provision of the Bolsa Chica LCP Wetland Restoration Program.~~

~~38. Prior the issuance of any grading permit in the lowland, the applicant shall prepare and implement as appropriate a program for approval of Manager, EMA Environmental Planning Division in consultation the Manager, EMA Project Planning and Manager, EMA Coastal Facilities as well as the California Department of Fish and Game and U. S. Fish and Wildlife Service to determine the effectiveness of the coyote as a control agent for the red fox at Bolsa Chica. (Mitigation Measure 4.8-1)~~

~~39. Prior to the issuance of any building permit, the applicant shall consult with California Department of Fish and Game (CDFG) and U. S. Fish and Wildlife Service (USFWS) and prepare a relocation program for any raptors found to prey upon nesting sensitive target species or other sensitive species, to the approval of Manager Environmental Planning in consultation with Manager of Project Planning and Manager, Program Planning Division (Mitigation Measure 4.8-2)~~

39. ***At the time of submittal of any coastal development permit for residential development on the Mesa, including any proposed subdivision of the Mesa, the landowner/Master Developer shall submit a long term habitat management plan for all areas owned by the applicant on or adjacent to the Bolsa Chica Mesa which are designated as buffer, Conservation, or Open Space and Recreation. This long term management plan shall be prepared in consultation with the California Department of Fish and Game (CDFG) and the U.S. Fish and Wildlife Service. This long term management plan shall, at a minimum, provide for:***

a. Landscaping provisions which include maintenance of the viability of the Eucalyptus tree ESHA, initial and continued weed eradication, and the removal of exotic plants and non native species which are invasive and considered inappropriate by CDFG & USFWS.

b. Provisions for protecting natural resources from domesticated pets and unauthorized human entry.

c. Provisions for public education such as public interpretive signs and brochures for homeowners advising them on how to avoid using plants and animals which could affect the ecology of the Conservation planning areas.

d. Provisions for a fence separating the conservation areas from both the trail and residential area on the upper bench and the interpretive trail along the edge of the Fish and Game Reserve. Each fence shall prevent normal access by humans and dogs and shall be a minimum of 4 feet in height with a solid top between posts. Each fence shall be constructed of a sturdy, long-lasting wire material such as chain link and shall extend 6 inches below the ground surface. Adjacent to the Fish and Game reserve, the bottom of the fence may be as much as 12 inches above the ground surface if dogs are prohibited on the trail and upon approval of the CDFG and USFWS.

e. Provisions which restrict access from the lowlands to the south into the Eucalyptus tree ESHA and adjacent upland areas. Unless there are other effective provisions on adjacent lands to prevent access, the Eucalyptus tree ESHA shall be separated from the adjacent lowlands by a chain link fence a minimum of 7 feet in height. Portions of the bottom of the fence may be up to 18 inches above the ground surface to allow access by small mammals.

f. Provisions which ensure that native shrubs appropriate to the area shall be planted on both sides of all fences adjacent to trails or residential areas to further restrict access.

g. Provisions for an irrevocable offer of dedication of an open space and conservation easement over all areas designated as

Conservation in Figure 2.2-1prior to issuance of any coastal development permit for subdivision of the LCP area.

h. The landowner/Master Developer shall implement all management measures prior to issuance of any coastal development permit for residential construction other than grading. The landowner/Master Developer shall have management responsibility until the offer(s) of dedication are accepted. Any accepting public agency will have long-term management responsibility after any offers of dedication are accepted.

~~40. Prior to the issuance of any building permit, the applicant shall provide a management plan consistent with the LCP to specify how public visitation of the natural areas will be controlled or managed to the approval of Manager, HBP Program Planning. The plan shall include, at minimum:~~

~~a. methods for public education on sensitive habitats and plants,~~

~~b. identification of the group or agency which will enforce access restrictions and the restrictions to be employed in the various habitats, and~~

~~c. restriction of access from community trail users during the nesting season of Federal and State listed Endangered and Threatened bird species (i.e., March 15 to August 15). (Mitigation Measure 4.8-3)~~

~~41. Prior to the issuance of any building permit, the applicant shall provide to Manager, Environmental Planning in consultation with Manager, Coastal Resources Wildlife a management plan to specify how wildlife habitats shall be maintained and managed over the long term. This plan shall include, at a minimum: methods for ongoing weed eradication, methods for public education, including information regarding invasive and exotic plants that homeowners could avoid planting in their yards and provisions for rice straw or equivalent weed-free straw bales used during erosion control to prevent additional introduction of exotic species into native habitats. (Mitigation Measure 4.8-4)~~

2.3.13 Transportation and Circulation

42. Prior to filing of ~~the first~~ ***any coastal development permit for the approval of any subdivision of the Mesa*** ~~tentative map for this~~

~~development except for financing and conveyance purposes~~, the applicant shall prepare ~~an Area Traffic Improvement Plan (ATIP)~~ ~~Action Plan~~ ***a traffic improvement plan*** for the entire development for approval by the ~~Director, EMA Transportation~~ ***Manager, Environmental and Project Planning Division***. Said plan shall be approved by the ~~Director, EMA Transportation~~ ***Manager, Environmental and Project Planning Division*** prior to ~~the recordation of first tentative map~~ ***issuance of any coastal development permit for any subdivision of the Mesa***. Said ***plan*** ~~Action Plan~~ shall include the following:

a) Roadway Capacity improvements including full construction component and fair share construction component as identified in the project traffic study of August 12, 1994 by RKJK & Associates unless otherwise specified in a Board of Supervisors adopted Development Agreement for this project.

b) Right-of-way acquisition method to facilitate roadway improvements.

c) Cost estimate and financial responsibility and obligation for said improvements.

d) ATIP Action Plan project management, phasing and implementation strategy and obligation for both fair share and full construction improvements.

e) ~~Define circulation phasing and implementation~~ ***Identify necessary improvements*** associated with Mesa ~~and Lowland~~ development.

f) ***Provide evidence that related improvements required to support residential development of the Mesa will maintain or improve the Level of Service (LOS) from pre-project levels for both Warner Avenue and Pacific Coast Highway.*** ~~Other data deemed necessary by the Director, EMA Transportation~~.

g) Demonstrate how improvements necessary to accommodate residential development shall be constructed prior to issuance of any coastal development permit authorizing residential construction other than grading.

~~43. Prior to the issuance of the first building permit for each phase of project development as identified in Table D/3 Supplement to the Robert Khan, John Kain and Associates (RKJK) traffic study of August 12, 1994, unless~~

~~otherwise specified in a Board of Supervisors adopted Development Agreement, the following provisions shall be met:~~

~~a) Award of construction contract for all on-site circulation improvements identified in the subject RKJK & Associates traffic study phasing plan.~~

~~44. Prior to issuance of the first building permit for each phase of project development as identified in the RKJK traffic study of August 12, 1994, unless otherwise specified in a Board of Supervisors adopted Development Agreement, the following shall be performed in a manner meeting the approval of the Director, EMA Transportation:~~

~~a) Eighteen months prior to issuance of any building permit for each phase of development, the applicant shall submit to the county all rights/of/way documents necessary to facilitate rights/of/way acquisition and construction of improvements for which the project has a full construction responsibility. These shall include rights/of/way maps, legal description, deeds and title reports. The County will undertake the acquisition of all rights/of/way. Within 60 days of a written request by the County EMA, the applicant shall deposit with the County cash to reimburse the County for the cost incurred for the right/of/way acquisition including the purchase of said right/of/way.~~

~~b) Applicant shall prepare cost estimate and award construction contracts for said improvements identified above, unless the County agrees to undertake the design and/or construction of said improvements. Should the County take the lead in the design and construction of these improvements, the applicant shall deposit cash with the County for the cost it will incur to implement said improvement within 60 days of written notification by the County EMA.~~

~~c) The County shall reserve the right, in consultation with the applicant, to require modification of the Development Phasing Plan to advance circulation improvements from one phase to another should the County determine that any improvement identified in said Development Phasing Plan cannot be feasibly implemented as required by the Plan. This provision shall apply to circulation improvements for which the applicant has full construction responsibility.~~

~~d) The applicant's obligation to full construction improvement are located at: Bolsa Chica/Warner; Bolsa Chica/Edinger; Golden West/Slater; Bolsa Chica/I-405 and SR-22 Interchange; Bolsa Chica/Westminster; Warner/I-405 Interchange; Warner/ Huntington Harbour Connection to Los Patos; Warner/Graham; Edward/Talbert; Golden West/Edinger; PCH/Warner; PCH adjacent to project half section improvement; Bolsa Chica/ Garden Grove Boulevard through I-405 and SR-22 Interchanges, including roadway widening to 200 feet south of eastbound I-405 off-ramp and are fully described in RKJK traffic study of August 12, 1994.~~

~~45. Prior to issuance of any building permit for any development for this project, the applicant shall enter into an agreement with the County of Orange to fund the improvements at the following intersection on a fair share basis in accordance with the findings, phasing and assumptions of the RKJK traffic study of August 12, 1994 unless otherwise specified by a Board of Supervisors adopted Development Agreement:~~

~~**Intersections**~~	~~**Jurisdiction**~~
~~PCH - Warner to L.A. County line~~	~~Seal Beach,~~ ***~~County of Orange~~***
~~Beach/Warner~~	~~Huntington Beach~~
~~Magnolia/Warner~~	~~Huntington Beach/Fountain Valley~~
~~PCH - Golden West to Warner~~	~~Huntington Beach,~~ ***~~County of Orange~~***
~~Beach Blvd./Slater~~	~~Huntington Beach~~
~~Hoover/Bolsa Ave.~~	~~Westminster~~
~~Gothard/McFadden~~	~~Huntington Beach/Westminster~~
~~Newland/Warner~~	~~Huntington Beach/Fountain Valley~~
~~Magnolia/Slater~~	~~Fountain Valley~~
~~Springdale/Westminster~~	~~Westminster~~
~~Golden West/Slater~~	~~Huntington Beach~~
~~Golden West/Garfield~~	~~Huntington Beach~~
~~Golden West/Yorktown~~	~~Huntington Beach~~
~~Gothard/Warner~~	~~Huntington Beach~~
~~PCH/Beach Blvd.~~	~~Huntington Beach~~
~~Bushard/Slater~~	~~Fountain Valley~~

~~a) The County shall reserve the right, in consultation with the affected jurisdiction and the applicant, to propose and implement substitute circulation improvements for any intersection improvement listed in this fair share category, should the County determine that said improvements is not feasible or practical at the time, it is identified for implementation pursuant to the development phasing schedule as identified in the RKJK traffic study of August 12, 1994 unless otherwise specified in a Board of Supervisors adopted. The~~

~~applicant's financial obligation to said improvement shall be the same as for the initial improvement.~~

2.3.14 Master Plan of County Bikeways

46. Prior to the ~~recordation of the applicable final map, the applicant shall implement~~ ***issuance of the any coastal development permit for subdivision of the Mesa, the private landowner shall irrevocably offer to dedicate to the County or other public agency, all public access easements under the ownership of the landowner for*** all bike routes on the site consistent with the ***Land Use Plan*** ~~Master Plan of Countywide Bikeways (MPCB)~~. ~~These include:~~ ***This includes*** Route No. 25 (a Class I trail along Pacific Coast Highway) ~~and Route No. 30 (a Class I bike trail along EGGW Channel) and Route 105 (a Class I trail across Bolsa gap) linking Route Nos. 30 and 34 to the County or it's designee~~, in a form approved by the ~~Director, EMA Harbors, Beaches and Parks~~ ***Manager, Harbors, Beaches and Parks Division*** and County Counsel. ***Prior to issuance of the first coastal development permit for residential construction other than grading, the applicant shall construct all bikeway improvements.*** Improvements shall include design, grading, trail construction, fencing, signing, striping, erosion control, etc., in a manner meeting the approval of the ~~Director, EMA Harbors, Beaches and Parks~~ ***Manager, Harbors, Beaches and Parks Division***.

47. Prior to the issuance of any grading permit, the applicant shall ensure compliance with South Coast Air Quality Management District (SCAQMD) Rule 402, which requires that there be no dust impacts off-site sufficient to cause a nuisance, and SCAQMD 403, which restrict visible emissions from construction to the Manager, ~~Development~~ ***Subdivision and Grading Services*** ~~Division~~, and shall list all such measures on each grading plan under the General Notes Section.

48. Prior to the issuance of any building permit, the applicant shall ensure compliance with SCAQMD Rule 403 to the Manager, ~~Development~~ ***Subdivision and Grading Services*** ~~Division~~ by demonstrating the evidence of satisfying measures including but not limited to:

    - mitigation for secondary source emissions (i.e., emissions associated with stationary sources within the development) through the measures listed above and comply with Title 24 energy-efficient design regulations and shall incorporate to the maximum extent feasible, the

design measures listed in ***EIR No. 551*** Section 4.10.5. (Mitigation Measure 4.10-6a and b)

2.3.16 Noise

49. Prior to the issuance of any building permit, the applicant shall provide an acoustical analysis subject to the approval of Manager, Building Permit~~s~~ ***Services*** to ensure that all new residential lots and dwelling units shall be sound attenuated against present and projected noise so as not to exceed an exterior standard of 60 dBA Ldn in outdoor living areas and an interior standard of 45 dBA Ldn in all habitable rooms. The analysis shall be prepared by a County-certified acoustical consultant and shall describe the acoustical design features of the structures proposed by the applicant. (PDF-3)

~~50. Prior to the issuance of any building permit for any commercial activity, the applicant shall provide an acoustical analysis subject to the approval of Manager, Building Permit to ensure that any commercial activity noise is not intrusive because of the time of day, noise character or overall exterior level into the adjacent or nearby residential community. The acoustical analysis shall describe the acoustical design features of the structures proposed by the applicant of the commercial uses. (PDF-4)~~

51. Prior to the issuance of any grading permit for extending the segment of Bolsa Chica Street from its current terminus at Warner Avenue to the Bolsa Chica Mesa, the applicant shall provide an acoustical analysis, subject to the approval of Manager, Building Permit ***Services***, to confirm noise impacts and determine the extent of specific noise reduction measures necessary to achieve the 45 dBA interior noise level in residences adjacent to Bolsa Chica Street between Warner Avenue and the Mesa Connector. (Mitigation Measure 4.11-1)

~~52. Prior to the issuance of any building permits for residential development in the Lowland, the applicant shall provide an acoustical analysis, subject to the approval of Manager, Building Permit, to confirm noise impacts and determine the extent of specific noise reduction measures necessary to achieve the 45 dBA interior noise level in residences adjacent to Graham Street up to Slater, Springdale Street to Talbert and Talbert Avenue to Springdale. (Mitigation Measure 4.11-2)~~

2.3.17 Cultural Resources

53. ~~Prior to the issuance of any grading permit~~ ***In conjunction with the submittal of any coastal development permit for development, including any proposed subdivision, within areas that contain cultural resources***, the applicant shall complete, to the approval of ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks*** the research design for recovered material analysis for the Bolsa Chica Region currently in preparation. The research design shall contain a discussion of important research topics for recovered material analysis that can be addressed employing data from the Bolsa Chica sites. The research design shall be reviewed by at least three qualified archaeologists ***(peer review committee)***, ***the State Office of Historic Preservation and the Native American Heritage Commission*** ~~as required by California Coastal Commission (CCC) guidelines~~. ***Additionally the research design shall be developed in consultation with affected Native American groups. The peer review committee shall assure the implementation of the mitigation measures consistent with the archeological research design.*** (PDF-1)

54. ~~Prior to issuance of any grading permit data recovery program shall be completed by the applicant meeting the approval of the Manager, HBP Coastal Facilities Division for important or unique archaeological resources in areas proposed for urban development on Bolsa Chica Mesa and for proposed urban development and wetlands restoration.~~ ***Prior to filing a coastal development permit application for development (including any subdivision) within areas that contain cultural resources, a systematic cultural resources survey, meeting the approval of the Manager, Coastal and Historical Parks, shall be submitted evaluating the significance of the deposits. Significant sites shall be preserved in open space. If preservation can not be accomplished consistent with the Land Use Plan, a data recovery plan shall be implemented in coordination with any development activities.***

55. Prior to the issuance of any ~~building~~ ***coastal development*** permit ***for grading***, the applicant shall, in a manner meeting the approval of the Manager ~~HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks,*** extend the existing reburial agreement executed between the project applicant and the Juaneno Band of Mission Indians regarding the treatment and disposition of prehistoric Native American human remains discovered at ORA-83 if any additional remains are discovered on the Bolsa Chica Mesa. (PDF-8)

56. Prior to the issuance of any ~~grading~~ ***coastal development*** permit ***for grading***, the project applicant shall provide written evidence to the ~~Chief, EMA/Regulation/Grading Section~~ ***Chief, Geotech/Grading Plan Check***, that a County-certified archaeologist has been retained, shall be present ***at*** the pre-grading conference, ***shall be present on-site to monitor grading activities,*** shall establish procedures for archaeological resource surveillance, and shall establish, in cooperation with the project developer, procedures for temporarily halting or redirecting work to permit the sampling, identification, and evaluation of the artifacts as appropriate. If additional or unexpected archaeological features are discovered, the archaeologist shall ***immediately suspend all development activity until and*** report such findings to the project developer and to the ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks***. ***Development activity shall be suspend until a determination can be made as to the significance of the findings***. If the archaeological resources are found to be significant, the archaeological observer shall determine appropriate actions, in cooperation with the project developer, for exploration and/or salvage. Prior to the issuance of a precise grading permit, the archaeologist shall submit a follow-up report to the ~~Manager, Harbors, Beaches and Parks/Program Planning Division~~ ***Manager, HBP Program Management and Coordination***, which shall include the period of inspection, an analysis of any artifacts found and the present repository of the artifacts. Excavated finds shall be offered to the County of Orange, or designee, on a first refusal basis. If Native American remains are discovered within the Bolsa Chica, the project applicant shall comply with the procedures set forth in Section 5097.98 of the California Public Resources Code and shall consult with the most likely descendants designated by the Native American Heritage Commission to obtain recommendations on the treatment and disposition with appropriate dignity of the human remains and associated grave good. The applicant may retain said finds if written assurance is provided that they will be properly preserved in Orange County, unless said finds are of special significance, or a museum in Orange County indicates a desire to study and/or display them at the time, in which case items shall be donated to the County, or designee. These actions, as well as final mitigation and disposition of the resources, shall be subject to the approval of the ~~Manager, Harbors, Beaches and Parks/Program Planning Division~~ ***Manager, HBP Program Management and Coordination***. (SC-1) (SC-2)

57. Prior to the ~~issuance of any grading permit~~ ***filing of an application for any coastal development permit application for development, including any proposed subdivision;*** a County-certified archaeologist

shall be retained by the applicant to complete literature and records searches for recorded sites and previous surveys. In addition, a field survey shall be conducted by a County-certified archaeologist unless the entire proposed project site has been documented as previously surveyed in a manner which meets the approval of the ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks***. A report of the literature and records search and the field survey shall be submitted to and approved by the ~~Manager, Harbors, Beaches and Parks/Program Planning Division~~ ***Manager, HBP Program Management and Coordination***. Mitigation Measures ~~may~~ ***shall*** be required, ~~depending on~~ ***consistent with*** the recommendations of this report. (SC-3)

58. Prior to the ~~issuance of any grading permit~~ ***filing of an application for any coastal development permit for development, including any proposed subdivision;*** a County-certified archaeologist shall be retained by the applicant to perform a subsurface test level investigation and surface collection as appropriate. The test level report evaluating the site shall include discussion of significance (depth, nature, condition and extent of the resources), final mitigation recommendations and cost estimates. Excavated finds shall be offered to the County of Orange, or designee, on a first refusal basis. Applicant may retain said finds if written assurance is provided that they will be properly preserved in Orange County, unless said finds ~~area~~ ***are*** of special significance, or a museum in Orange County indicates a desire to study and/or display them at the time, in which case items shall be donated to the County, or designee. Final mitigation shall be carried out based upon the report recommendations and a determination as to the site's disposition by the ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks***. Possible determinations include, but are not limited to, preservation, salvage, partial salvage or no mitigation necessary. (SC-4)

59. Prior to ~~issuance of any grading permit~~ ***filing of an application for any coastal development permit for development, including any proposed subdivision***, the project applicant shall provide written evidence to the ~~Chief, EMA/Regulation/Grading Section~~ ***Chief, Geotech/Grading Plan Check***, that a County-certified archaeologist has been retained to conduct salvage excavation of the archaeological resources in the permit area. Excavated finds shall be offered to the County of Orange, or designee, on a first refusal basis. The applicant may retain said finds if written assurance is provided that they will be properly preserved in Orange County, unless said finds are of special significance, or a museum in Orange County indicates a desire to study and/or display them at the time, in which case items shall be donated to

the County, or designee. A final report of the salvage operation shall be submitted to and approved by the ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks***, prior to ~~any grading~~ ***filing an application for any coastal development permit which would permit grading*** in the archaeological site areas. (SC-5)

60. Prior to the ~~issuance of any grading permit~~ ***filing of an application for any coastal development permit*** for the Harriett Wieder Regional Park, ~~Manager, HBP Design~~ ***the applicant*** shall retain a County-certified archaeologist to produce a comprehensive archaeological resource management program acceptable to the ~~Director, Harbors, Beaches and Parks~~ ***Manager, Harbors, Beaches and Parks Division***. The resource management program shall include such requirements as further analysis of archaeological sites, resource recovery, or in situ preservation. Measures to protect resources in areas proposed as open space will also be included. The program shall be implemented according to a schedule with conforms to the proposed phasing of park development. Additional recommendations may be made upon completion of test-level investigation or at the professional discretion of the consulting archaeologist conducting the test-level work.

2.3.18 Paleontological Resources

61. Prior to the ~~issuance of any grading permit~~ ***filing of an application for the any coastal development permit application for development***, the project applicant shall provide written evidence to the ~~Chief, EMA/Regulation/ Grading Section~~ ***Chief, Geotech/Grading Plan Check***, ~~the~~ ***that*** a County-certified paleontologist has been retained by the applicant to complete literature and records searches for recorded sites and previous surveys. In addition, a field survey shall be conducted by a County- certified paleontologist unless the entire proposed project site has been documented as previously surveyed in a manner which meets the approval of the ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks***. A report of the literature and records searches and field survey shall be submitted to ~~a~~ ***and*** approved by the ~~Manager, Harbors, Beaches and Parks/Program Planning Division~~ ***Manager, HBP Program Management and Coordination***. ~~Future mitigation~~ ***Mitigation*** shall ~~depend upon~~ ***be required consistent with*** the recommendations in the report. (SC-1)

62. Prior to the issuance of any ***coastal development permit that would permit any*** grading ~~permit~~, the project applicant shall provide written evidence to the ~~Chief, EMA/Regulation/Grading Section~~ ***Chief,***

Geotech/Grading Plan Check, that a County-certified paleontologist has been retained by the applicant to conduct pre-grading salvage and prepare a catalogue of the exposed resources. Excavated finds shall be offered to the County of Orange, or designee, on a first refusal basis. The applicant may retain said finds if written assurance is provided that they will be properly preserved in Orange County, unless said finds are of special significance, or a museum in Orange County indicates a desire to study and/or display them at the time, in which case items shall be donated to the County, or designee. The paleontologist shall submit a follow-up report for approval by the ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks***, for review and approval, which shall include methodology, an analysis of artifacts found, a catalogue of artifacts, and their present repository. (SC-2)

63. Prior to the issuance of any ***coastal development permit that would permit any*** grading ~~permit~~, the project applicant shall provide written evidence to the ~~Chief, EMA/Regulation/Grading Section~~ ***Chief, Geotech/Grading Plan Check***, that a County-certified paleontologist has been retained to observe grading activities and salvage and catalogue fossils as necessary. The paleontologist shall be present at the pre-grading conference, shall establish procedures for paleontological resource surveillance, and shall establish, in cooperation with the project developer, procedures for temporarily halting or redirecting work to permit sampling, identification, and evaluation of the fossils. ***If paleontological resources are uncovered, the paleontologist shall immediately suspend all development activity until a determination can be made as to their significance shall report such findings to the project developer and to the Manager, Coastal and Historical Parks.*** If major paleontological resources are discovered, which require long-term halting or redirecting of grading, the paleontologist shall report such findings to the project developer and to the ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks***. The paleontologist shall determine appropriate actions, in cooperation with the project developer, which ensure proper exploration and/or salvage. Excavated finds shall be offered to the County of Orange, or its designee, on a first-refusal basis. The applicant may retain said finds if written assurance is provided that they will be properly preserved in Orange County, unless said finds are of special significance, or a museum on Orange County indicates a desire to study and/or display them at a time, in which case items shall be donated to the County, or designee. These actions, as well as final mitigation and disposition of the resources, shall be subject to the approval by the ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks***. Prior to the issuance

of a ***coastal development permit for*** ~~precise~~ grading ~~permit~~, the paleontologist shall submit a follow-up report for approval by the ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks***, which shall include the period of inspection, a catalogue and analysis of the fossils found, and present repository of the fossils. Monthly grading observation reports shall be submitted to the grading inspector on all projects which exceed 100,000 cubic yards, unless no earthwork has been done during the month. These reports shall include the period of inspection, the list of fossils collected, and their present repository. (SC-3)

2.3.19 Aesthetics

64. Prior to the issuance of ~~each~~ ***any coastal development permit for*** grading ~~permit or recordation of any applicable tract or parcel map, whichever happens first~~, the applicant shall provide the following plans subject to the approval of ~~Manager, HBP Coastal Facilities Division~~ ***Manager, Coastal and Historical Parks*** in consultation with the Manager, Project Planning Division which ~~indicates~~ ***indicate*** that ***grading has been minimized, that the existing landforms have been preserved to the maximum extent feasible, and that the*** graded areas will be compatible with the adjacent existing and proposed land uses:

    a. A landscaping plan with setbacks along Los Patos Avenue including a landscaped ~~parkway with a minimum width of 34-foot~~ ***area and public trail within the expanded right-of-way***, including a community theme wall.
    b. An urban edge treatment plan for development areas adjacent to ~~wetlands~~ ***areas designated as Conservation or Open Space and Recreation***, which includes but is not limited to: building height and setback limits; landscape and fuel modification treatments; provisions for walls, fences or berms; slope gradients and ratios, slope drainage structures, and architectural or landscape design themes.

2.3.20 Public Services and Utilities

66. Prior to the issuance of any ***coastal development permit for subdivision or*** grading ~~permit or approval of any tentative subdivision map~~, whichever comes first, the project applicant shall provide evidence to Manager, ~~Development~~ ***Subdivision and Grading Services*** ~~Division~~ that water and energy conservation features shall be incorporated into

new residential development as per Title 24 of the California Code Regulations. (SC-1)

68. Prior to recordation of any final tract map (except for financing purposes), the project proponent shall enter into a secured (such security should be acceptable to the County of Orange) fire protection agreement with the County of Orange or its successor fire protection agency, including but not limited to a Fire Protection District, in a form approved by the Orange County Fire Department or successor agency and the County Administrative Office. This agreement shall contain:

    4) Provision for the timing of fire station construction and commencement of station operation as determined appropriate by the Orange County Fire Department, or successor agency; ***and***

    5) Provision for a mitigation program to eliminate or minimize any negative fiscal impact the project may have on the Fire Fund if a project induced Fire Fund shortfall is projected to exist at the time a permanent fire station is operational~~;~~

    ~~6) Provision for an adequate all-weather fire vehicle access road over the East Garden Grove-Wintersburg Flood Control Channel, meeting the approval of the Fire Department or successor agency, to ensure adequate fire protection access for both mesa and lowlands portions of the project~~.

70. Prior to recordation of any final tract map (except for financing purposes), the project applicant shall pay the statutory school fee required for the amount of development within the area of the final tract map, or enter into an agreement with the affected school district to provide those measures deemed necessary to address the impact of the project which may include the construction of new schools, the payment of additional fee for the use of temporary facilities in a manner meeting the approval of the ~~Manager, EMA Development services~~ ***Manager, Subdivision and Grading Services***. (Mitigation Measure 4.16-3)

2.3.21 Recreation

71. Prior to the issuance of ~~any grading permit or recordation of a subdivision map, whichever comes first~~ ***any coastal development permit for subdivision of the Bolsa Chica Mesa***, the applicant shall dedicate to the County of Orange in a manner meeting the approval of the ~~Manager, HBP Program Planning Division~~ ***Manager, HBP Program Management and Coordination***, 49 acres of land within the Bolsa Chica Project Area

required for completion of the 106-acre Harriett Wieder Regional Park as identified in the Bolsa Chica Local Coastal Program and (PDF-1)

~~72. Prior to the issuance of building permits within a recorded final tract map area, the Local Park Code requirements for the Bolsa Chica Local Coastal Program Land Use Plan shall be satisfied, for that portion of the project site, through park dedication to the satisfaction of the Manager HBP Program Planning Division.~~

~~73. Prior to the issuance of building permits or the recordation of an associated final tract map, whichever comes first, all projects shall be required to pay development fees for any facilities for which an applicable fee program has been adopted by the Board of Supervisors as provided in Sections 7-9-700 through 7-9-713 and 7-9-316 of the Codified Ordinances of the County of Orange. This condition may be satisfied by entering into an implementation agreement with the County in a manner meeting the approval of the County Administrative Officer~~

~~74. As an alternative method of satisfying conditions expressly related to Lowland development, including but not limited to, Conditions 9, 21 and 34, an application (by a landowner other than the Landowner/ Master Developer) for a Coastal Development Permit for residential units in the Lowland portion of the Planning Area 9 or in Planning Area 10 may be considered for approval if the Landowner/Master Developer has had denied, fails to pursue, fails to timely receive or fails to implement a Section 404 Permit and/or CDP for Lowland development under the circumstances described in Subparagraph's a, b, c, or d below. As a condition of approval, such a Coastal Development Permit must provide a program to mitigate (on its own property or other available property) its wetlands, conservation, flood control, and other environmental impacts, to the extent feasible, in compliance with CEQA. This will require, at a minimum, a new Initial Study. The mitigation program shall be subject to review and recommendation by Manager, Flood Program for Condition 21 and by Manager, Environmental Planning Division for Condition 34 and all other mitigation. The CDP application and all mitigation shall be considered for approval by the Planning Commission.~~

~~The circumstances which may give rise to such a CDP application are:~~

~~a) Denial of Permit. "Denial" of permit shall be deemed to occur upon the denial of Landowner/Master Developer's application for either (i) a Section 404 Permit for Lowland residential development and restoration or (ii) a Coastal Development Permit to implement that Section 404 Permit.~~

~~b) Failure to Pursue Section 404 Permit and/or CDP. Landowner/Master Developer shall be deemed to have "failed to pursue" a Section 404 Permit and/or CDP if, two years after the COUNTY's initial approval of the LCP, Landowner/Master Developer (i) has not had a Section 404 Permit application either granted or denied and (ii) Landowner/Master Developer no longer has either a Section 404 Permit or CDP application pending for Lowland residential development (or has withdrawn its consent to a pending application for which COUNTY is a co-applicant).~~

~~c) Failure to Receive Permits. Landowner/Master Developer shall be deemed to have "failed to receive" a Section 404 Permit and/or CDP if, two years after COUNTY's initial approval of the LCP, Landowner/Master Developer has applications pending for either or both the Section 404 Permit and the CDP, but one or more of those applications has not been granted or denied.~~

~~d) Failure to Implement. Landowner/Master Developer shall be deemed to "fail to implement" in the event that an issued Section 404 Permit and/or CDP has expired, or if a revised application, application for modification, or application for extension for such 404 Permit and/or a CDP is filed by Landowner/Master Developer.~~

3. CONSERVATION PLANNING AREA REGULATIONS AND STANDARDS

3.1 PURPOSE AND INTENT

The Conservation Planning Areas of the Bolsa Chica Planned Community provide for natural resource preservation, creation and restoration, controlled public coastal access and limited public use, and ongoing restoration monitoring and maintenance. ~~With the exception of the State's Ecological Reserve (Conservation Planning Areas 1A, 1B, and 1C), the lands in this category are currently under private ownership and are planned to be dedicated or transferred to the County of Orange or a County-approved entity over a period of time.~~ Prior to dedication/transfer, the private landowners will be responsible for the management of these lands.

These Conservation Planning Area regulations and standards are intended to facilitate implementation of the Wetlands/Biological Resources Component of the Bolsa Chica LUP ***in the areas governed by this certified LCP and designated Conservation.***~~, and to complement the implementing provisions of the Bolsa Chica Wetlands Restoration Program, which will restore and create various hydrologic regimes within the Bolsa Chica Planned Community boundary, including Full Tidal and Muted Tidal wetlands, Seasonal Ponds, and a Perennial Pond. Environmentally Sensitive Habitat Areas (ESHAs) will be protected adjacent to Pacific Coast Highway, enhanced on Rabbit Island, and recreated along the Huntington Mesa, above and adjacent to the Seasonal Ponds.~~

~~Once the wetlands are restored, these regulations permit the maintenance, monitoring, management, and protection of the Wetlands Ecosystem Area, while allowing limited public access, wildlife interpretation, and passive recreational activities such as a ranger-managed kayak/canoe program, restricted-access interpretive trails, and scenic overlooks.~~

~~All improvements within Conservation Planning Areas shall be in conformance both with this Chapter of the Bolsa Chica PC Program and with the Bolsa Chica Wetlands Restoration Program, which serves as the Master Coastal Development Permit for these Planning areas (see Section 10.2.3).~~

3.2 PRINCIPAL PERMITTED USES

3.2.1 *The* Principal Permitted *Use* ~~Uses requiring a Project Coastal Development Permit Per Chapter 10 (Discretionary Permits And Procedures)~~:

1. ~~All development and construction activities necessary to implement each phase of the Wetlands Restoration Program~~ ***The preservation, creation, enhancement, and restoration of wildlife habitat.***

~~2. Public interpretive trails and areas (access may be limited to protect wildlife/habitat values).~~

~~3. Public scenic viewpoints and visual overlook areas within the wetlands Buffers.~~

~~4. Public facilities for small non-motorized boats (kayaks and/or canoes), and facilities for boats and dredges necessary to operate and maintain the Wetlands Ecosystem Area. Permitted ancillary uses shall accommodate dry storage for kayaks and/or canoes, a launching ramp, and other necessary related facilities (e.g., hoists, stacking and staging areas) to provide safe public access to, and use, of coastal waters.~~

~~5. New oil production facilities per Chapter 9, Oil Production Regulations. (Existing oil production facilities do not require a Coastal Development Permit.)~~

~~6. Public works, maintenance roads, drainage improvements, flood control improvements, and other infrastructure and/or utilities necessary for the permitted development of any Planning Area.~~

~~7. Remedial grading required to resolve geotechnical/soils engineering problems associated with the permitted development of any Planning Area and/or to satisfy engineering requirements for related infrastructure and other development-related improvements.~~

3.2.2 Other Permitted Uses

1. Nature study, aquaculture, or similar resource dependent activities.

2. Public interpretive trails and areas (access may be limited to protect wildlife/habitat values).

3. Public scenic viewpoints and visual overlook areas (access may be limited to protect wildlife/habitat values)

4. Incidental public service purposes, including, but not limited to: burying cables and pipes, or inspection of piers and maintenance of existing intake and outfall lines.

5. An economically viable use authorized pursuant to the requirements of Section 10.2.3.3

3.3 ACCESSORY PERMITTED USES

Accessory uses and structures are permitted when customarily associated with and subordinate to a ~~Principal~~ Permitted Use on the same building site ***and where consistent with all other provisions of the Bolsa Chica LCP***, per Orange County Zoning Code Section 7-9-137, including:

3.3.1 Directional and ~~Identification Sign Program~~ ***identification signs*** per Chapter 8***, in particular, Section 8.2.3 (Sign Programs) and Section 8.5 (Signage for Public Access/Visitor-Serving Recreation Facilities) of this PC Program***.

3.4 PROHIBITED USES

3.4.4 Uses not provided for by Section 3.2 and 3.3 of this Chapter shall be prohibited~~; however, certain permitted uses are defined generally, and may require interpretation by the Director, EMA, per County Zoning Code Section 7-9-20~~.

3.5 INTERIM CONSERVATION MANAGEMENT REGULATIONS

The following interim conservation management regulations shall apply ~~to all private landowners~~ within ~~Conservation Planning Area 1D~~ ***the Conservation land use designation*** prior to the dedication/transfer of ~~land~~ ***property interests*** to the County of Orange, State, or other ***public or non-profit agency*** ~~County-approved entity~~ ***for preserving the area for conservation, restoration, and enhancement, or low intensity passive recreation consistent with resource protection. New development consistent with this section shall require a coastal development permit per Chapter 10 and Section 7-9-118 of the Orange County Zoning Code.***

3.5.1 The landowners may continue existing uses, and ***through a coastal development permi,*** may construct and maintain any fencing and access roads necessary for the continued use and protection of the property, and for facilities approved by the Director, ~~EMA~~ ***PDSD***, for the public health, safety, and welfare. ***Any development authorized under this section shall not adversely impact wetland and ESHA areas, and shall not interfere with historic public access.***

3.5.2 The landowners may implement ***new development under the*** ~~interim~~ ***Interim Conservation Management Regulations*** ~~land uses~~ subject to Section 2.2.20 of this PC Program ***provided the new development is limited to the following:***

1. County approved archaeological and paleontological sites;

2. Public access and Interpretive facilities.

3. Nature study, aquaculture, or similar resource dependent activities.

4. Incidental public service purposes, including, but not limited to: burying cables and pipes, or inspection of piers and maintenance of existing intake and outfall lines.

5. Restoration or enhancement of the wetland and ESHA resources

~~3.5.3 Landform alterations are allowed in Conservation Planning Area 1D to the extent required to accommodate flood control improvements.~~

~~3.6 CONSERVATION MANAGEMENT REGULATIONS~~

~~The following regulations shall apply to Conservation Planning Areas owned by the County or County-approved entity:~~

~~3.6.1 The County or County-approved entity shall have authority for oversight for, and phasing of, wetlands restoration as set forth in the Wetlands Restoration Program.~~

~~3.6.2 All improvements, including the creation and restoration of the various hydrologic regimes (i.e., wetlands habitats), Environmentally Sensitive Habitat Areas, and Buffers shall be governed by the Wetlands Restoration Program.~~

~~3.6.3 Conservation, monitoring, and maintenance of the Wetlands Ecosystem Area shall be as set forth in the Wetlands Restoration Program.~~

~~3.6.4 Portions of Environmentally Sensitive Habitat Areas shall be protected from human intrusion on a geographic and/or seasonal basis as necessary to achieve the goals of the Wetlands Restoration Program, including the protection of sensitive species.~~

~~3.6.5 Improvements related to scientific study, public access, and wetlands interpretation (e.g., ranger-controlled trails) shall be consistent with Wetlands Restoration Program standards.~~

~~3.6.7 All Buffers required for the protection of wetlands habitat and Environmentally Sensitive Habitat Areas are included within Conservation Planning Areas. Within such Buffers:~~

~~1. Class I Trails shall be permitted only above 5-feet Mean Sea Level (MSL). Trails may meander to provide visual interest and public overlooks of the wetlands.~~

~~2. Planting adjacent to Muted Tidal, Seasonal Pond, and Perennial Pond areas shall provide a transition from native plants required by the Wetlands Restoration Program for the wetlands to the palette of native and drought-tolerant plants approved for the Buffer pursuant to Chapter 6 of the Bolsa Chica LUP.~~

~~3. If elevated as a boardwalk, public access and visual overlooks may extend through a Buffer to edge of a hydrologic regime (i.e., Full Tidal, Muted Tidal, Seasonal Pond, or Perennial Pond boundary).~~

4. OPEN SPACE AND RECREATION PLANNING AREA REGULATIONS AND STANDARDS

4.1 PURPOSE AND INTENT

The ***Open Space and*** Recreation Planning Areas of the Bolsa Chica Planned Community are intended to implement:

(1) Chapter 4, Public Access and Visitor-Serving ***Recreation*** Component of the Bolsa Chica LUP;

~~(2) Orange County's approved General Development Plan and Resource Management Plan for Bolsa Chica Regional Park;~~

~~(3) Orange County's Local Park Code in a manner consistent with local resident needs;~~ and

(4) Orange County's Master Plans for Riding and Hiking Trails, and Class 1 Bicycle Trails within a park environment, consistent with the Recreation and Circulation Elements of the General Plan ***and to the extent permitted by the Bolsa Chica Local Coastal Program.***

The purpose of these provisions is to regulate the development of all ***Open Space and*** Recreational Planning Areas designated on the PC Development Map. These regulations are intended to provide for a wide variety of public ***open space and*** recreational uses including, but not limited to, regional parks, active and passive local parks, and regional trails and open space areas that physically and visually link Planned Community facilities with existing beaches and park areas.

The local public parks to be developed within the Bolsa Chica Planned Community are intended to ***serve the public*** ~~satisfy the requirements of the County's Local Park Code and Recreation Element~~, and will be offered for dedication to the County of Orange.

Public roads, utilities, drainage, and other infrastructure systems are permitted in Recreation Planning Areas both for the improvement of park and recreation facilities and, where necessary, to serve adjacent development areas.

Development within ***Open Space and*** Recreation Planning Areas shall be in conformance with this Chapter of the Bolsa Chica PC Program, ~~an~~ ***and the*** approved ~~Master~~ Coastal Development Permit~~, and an approved Area-wide Coastal Development Permit~~.

4.2 PRINCIPAL PERMITTED USES

4.2.1 ***The*** **Principal Permitted** ***Use*** ~~**Uses requiring a Coastal Development Permit per Chapter 10 (Discretionary Permits and Procedures):**~~

1. ~~All activities and facilities necessary to implement the approved General Development Plan and Resource Management Plan for Bolsa Chica Regional Park, except as modified below by 4.2.1(4).~~
   Any open space and passive recreation use, including but not limited to: pedestrian and equestrian trails, scenic viewpoints, informal interpretive displays, scenic viewpoints, visual overlook areas, picnic areas, restrooms and off-street parking.

~~2. Open Space and Passive Recreation areas~~

~~3. Community facilities per Section 6.2.1.~~

~~4. Active recreation areas, including tennis courts, basketball courts, volleyball courts, turf playfields, and tot-lots, except not within Recreation Planning Areas 2A and 2B (Bolsa Chica Regional Park).~~

~~5. Interpretive trails, scenic viewpoints, and visual overlook areas.~~

~~6. Family and/or group picnic areas.~~

~~7. Class I (Off-street) biking and hiking trails.~~

~~8. (Equestrian) riding and hiking trails, and staging areas.~~

~~9. Outdoor amphitheaters intended for interpretive ranger programs.~~

~~10. Visitor Centers and staffed interpretive exhibits, including the adaptive reuse of existing buildings and structures.~~

~~11. Unstaffed interpretive areas and exhibits.~~

~~12. Public facilities for small non-motorized boats (kayaks and/or canoes), and facilities for boats and dredges necessary to operate and maintain the Wetlands Ecosystem Area. Permitted ancillary uses shall accommodate dry storage for approximately 12-18 kayaks and/or canoes, a launching ramp, and other necessary related facilities (e.g., hoists, stacking and~~

~~staging areas) to provide safe public access to, and use, of coastal waters.~~

~~13. Restrooms.~~

~~14. Drainage and water retention facilities.~~

~~15. Public utility lines and facilities.~~

~~16. Maintenance of pubic roads and related infrastructure.~~

~~17. Public works, roads, drainage improvements, and other infrastructure necessary for the permitted development of other Planning Areas.~~

~~18. Remedial grading required to resolve geotechnical/soils engineering problems, associated with development Planning Areas and/or to satisfy engineering requirements for related roads, infrastructure, and other development-related improvements.~~

4.2.2 ~~Principal~~ *Other* Permitted Uses ~~requiring a Coastal Development Permit approved by the Planning Commission per Chapter 10 (Discretionary Permits and Procedures)~~:

~~1. Community facilities per Section 6.2.2.~~

2. Stand-alone Regional Park Concessions and commercial facilities per Orange County Zoning Code Section 7-9-89, limited to:

   ~~b. Interpretive kayak/canoe operations and related facilities under the specific control of the Orange County EMA Harbors, Beaches, and Parks Department or County-designated managing entity for the Wetlands Ecosystem Area.~~

~~3. New oil production facilities per Section 4.2 and Chapter 9, Oil Production Regulations (existing oil production facilities do not require a Coastal Development Permit).~~

4. Visitor centers and staffed interpretive exhibits, including the adaptive reuse of existing buildings and structures.

5. Public works, roads drainage improvements, and other infrastructure necessary for the permitted development in the Open Space and Recreation land use designations.

6. Remedial grading required to resolve geotechnical/soils engineering problems, associated with development occurring in the Open Space and Recreation land use designations and/or to satisfy engineering requirements for related roads, infrastructure, and other development-related improvements in the Open Space and Recreation land use designations.

7. Interpretive trails, scenic viewpoints, and visual overlook areas.

8. Family and/or group picnic areas.

9. Class I (Off-street) biking and hiking trails.

10. (Equestrian) riding and hiking trails, and staging areas.

11. Outdoor amphitheaters intended for interpretive ranger programs.

12. Unstaffed interpretive areas and exhibits.

13. Active recreation areas, including tennis courts, basketball courts, volleyball courts, turf playfields, and tot-lots, except not within Recreation Planning Areas 2A and 2B (Bolsa Chica Regional Park).

14. Restrooms.

15. Any other park and recreation use which the Planning Commission finds consistent with the purpose and intent of this land use category ***and which is consistent with all applicable policies of this LCP.***

4.3 ACCESSORY PERMITTED USES

4.3.3 Directional and identification signs per Chapter 8, in particular, Section 8.2.3 (Sign Programs) and Section 8.5 (Signage for Public Access/Visitor-Serving Recreation Facilities) of this PC Program.

4.4 PROHIBITED USES

4.4.4 Uses not provided for by Sections 4.2 and 4.3 of this Chapter shall be prohibited~~, however, certain permitted uses are defined generally, and may require interpretation by the Director, EMA, per EMA County Zoning Code Section 7-9-20~~.

4.4.5 Conversion of any public park to private park use or the reduction of any on-site park area through in-lieu park credits or any other manner as allowed in the Local Park Code.

4.5 SITE DEVELOPMENT STANDARDS

4.5.3 **Building setbacks:**

1. General: All buildings and/or structures shall be set back from property lines a distance at least equal to the height of the building or structure, and not less than thirty (30) feet from any adjacent development Planning Area.

4.5.6 **Off-street parking:** Shall be provided in accordance with Chapter 7 (Off-Street Parking Regulations). ***An adequate number of bicycle racks shall be provided in each Recreation Planning Area***.

4.5.7 **Screening of parking areas:** Public parking areas adjacent to, but outside of, public street rights-of-way shall be screened from view by earthen berms, fences, walls, and/or landscape plantings that, within five years, are at least seventy-five (75) percent opaque, provided such screening is consistent with public health and safety, and is approved by the ~~Manager, Orange County EMA - Harbors, Beaches and Parks, Design Division~~ ***Manager, Landscape Architecture***.

4.5.8 **Signs:** Shall be permitted in accordance with Chapter 8 (Sign Regulations). ***A comprehensive signage program for all public access/visitor-serving recreation facilities shall be provided and implemented with the construction of these facilities, and shall inform the public of the availability of, and provide direction to, the on-site recreation amenities of the Bolsa Chica LCP area***.

4.5.10 **Screening:**

1. Parking areas abutting streets and highways: A screen shall be installed along all ***off-street*** parking areas abutting a street or highway. Except as otherwise provided, the screening shall have a total height of not less than thirty --six (36) inches and not more than forty --two (42) inches.

4.5.11 Public coastal access and recreational opportunities, including opportunities for wetlands observation and passive recreation such as picnicking, shall be established within new recreation and visitor-serving facilities. Recreational facilities and uses shall be located and designed in such a manner that there will be no significant adverse impacts to habitat areas.

5. RESIDENTIAL PLANNING AREA REGULATIONS AND STANDARDS

5.1 PURPOSE AND INTENT

Residential Planning Areas of the Bolsa Chica Planned Community are established to provide for a wide variety of housing types including, but not limited to, single-family detached, single-family attached, planned unit developments, and multi-family developments (e.g., duplexes, condominiums, and apartments). These regulations also provide for recreation uses, community facilities, ancillary and accessory uses designed to be compatible with and enhance the residential uses. ~~Although market demand will need to be determined in conjunction with future Coastal Development Permits, Neighborhood Commercial uses are permitted in Medium-High Density Residential Planning Area 6 to serve the needs of both residents and visitors to Bolsa Chica, as set forth in the Land Use Plan.~~

Residential densities within the Planned Community are ***within the High (H) Density Residential category (>18 DU/Ac).*** ~~divided into the following categories:~~

~~Residential Density Category~~	~~Density Range~~
~~Low Density (L) Residential~~	~~3.5 - 6.5DU/Ac~~
~~Medium-Low (ML) Density Residential~~	~~6.5 - 12.5DU/Ac~~
~~Medium-High (MH) Density Residential~~	~~12.5 - 18DU/Ac~~

~~5.2 LOW DENSITY RESIDENTIAL PLANNING AREAS~~

~~Low Density Residential Planning Areas 10 and 11 provide for predominantly single-family detached housing but permit other low density housing types. Recreation uses, community facilities, and other uses accessory to a principal use are also allowed.~~

~~5.2.1 Principal Permitted Uses requiring a Coastal Development Permit per Chapter 10 (Discretionary Permits and Procedures):~~

1. ~~Detached and attached single-family dwellings (one dwelling per building site).~~

2. ~~Community care facilities per Orange County Zoning Code Section 7-9-141.~~

3. ~~Community facilities per Section 6.2.1.~~

4. ~~Local Parks per Chapter 6 and Orange County Local Park Code, Section 7-9-500.~~

5. ~~Accessory Permitted Uses referenced in Section 5.2.3 when located on a separate building site.~~

~~5.2.2 Principal Permitted Uses requiring a Coastal Development Permit approved by the Planning Commission per Chapter 10 (Discretionary Permits and Procedures):~~

1. ~~Residential Planned Developments, including patio home developments, per Orange County Zoning Code Section 7-9-110 to be approved by the Planning Commission.~~

2. ~~New oil production facilities, per Chapter 9, Oil Production Regulations (existing oil production facilities do not require a Coastal Development Permit).~~

3. ~~Community facilities per Section 6.2.2.~~

4. ~~Any other use which the Planning Commission finds consistent with the purpose and intent of these regulations.~~

~~5.2.3 Accessory Uses Permitted~~

~~Accessory uses and structures are permitted when customarily associated with and subordinate to a Principal Permitted Use on the same building site, per Orange County Zoning Code Section 7-9-137, including:~~

1. ~~Garages and carports.~~

2. ~~Detached accessory structures such as greenhouses, gazebos, cabanas, and storage sheds.~~

3. ~~Swimming pools, spas, therapy baths, water fountains, and related equipment.~~

4. ~~Covered patios and decks.~~

5. ~~Fences and walls.~~

6. ~~Tennis courts, parks, trails, greenbelts, and similar common landscape areas.~~

7. ~~Signs per Chapter 8, Sign Regulations.~~

8. ~~Any other accessory use which the Director, EMA, finds to be consistent with the purpose and intent of these regulations.~~

~~5.2.4 Temporary Uses Permitted~~

~~Temporary uses are permitted subject to the requirements of Orange County Zoning Code Section 7-9-136, "Temporary Uses and Structures."~~

~~5.2.5 Prohibited Uses~~

~~1. Commercial uses and structures.~~

~~2. Industrial and manufacturing uses and structures, except those related to oil production per Section 5.2.2 and Chapter 9, Oil Production Regulations.~~

~~3. The storage of vehicles, equipment, or products related to a commercial activity not permitted in this area.~~

~~4. The keeping of pets or animals for any commercial purpose.~~

~~5. Apiaries.~~

~~6. Uses not provided for by Section 5.2.1 through 5.2.3 shall be prohibited; however, certain permitted uses are generally defined and may require interpretation by the Director, EMA per Orange County Zoning Code, Section 7-9-20.~~

~~5.2.6 Site Development Standards~~

1. ~~**Building site area:** Four thousand (4,000) square feet minimum, except within three hundred (300) feet of existing single-family detached units adjacent to the Bolsa Chica Planned Community, in which case the minimum building site area shall be five thousand (5,000) square feet.~~

2. ~~**Building site width:** Forty (40) feet minimum.~~

3. ~~**Building height:** Thirty-five (35) feet maximum.~~

4. ~~**Building site coverage:** Fifty percent (50%) maximum.~~

5. ~~**Building setbacks:**~~

   a. ~~Front -- For single-family detached units located on through-travel streets, a minimum fifteen (15) feet from the property line, except garages and carports. The point of vehicular entry to a garage or carport shall be eighteen (18) feet minimum.~~

   b. ~~Side -- Minimum ten (10) feet aggregate for both sides. In those instances where a side yard is adjacent to a street, a five (5) foot minimum setback is required.~~

   c. ~~Rear -- Twenty (20) feet minimum.~~

6. ~~**Parking:** Off-street parking shall be provided per Chapter 7, Off-Street Parking Regulations.~~

7. ~~**Patios:** No attached or detached covered patio will be closer than three (3) feet to a property line, except the street-side property line of a corner lot where a minimum of ten (10) feet will be maintained.~~

8. ~~**Projections into required setbacks:** Eaves, cornices, chimneys, outside staircases, balconies, and similar architectural features may project a maximum of four (4) feet into any required lot setback or three (3) feet from the property line.~~

9. ~~**Fence/wall heights:** Maximum height for fences and walls will be in accordance with Orange County Zoning Code Section 7-9-137.5, except as otherwise permitted below, provided that sight distances for vehicular safety are not obstructed:~~

~~A. Where main buildings may be located -- the same as the main building height.~~

~~B. Within required front setback area -- forty-two (42) inches.~~

~~C. Within other setback areas -- six (6) feet. Higher walls for the purpose of noise mitigation or other health and safety measures may be approved by the Director, EMA, subject to approval of an acoustical analysis report.~~

~~5.3 MEDIUM-LOW DENSITY RESIDENTIAL PLANNING AREAS~~

~~Medium-Low Density Residential Planning Areas 5, 7, and 9 provide for predominantly single-family detached, single-family attached, and duplex housing. Residential planned unit developments, other multi-family developments, recreation uses, community facilities, and other uses accessory to a principal use are also allowed.~~

~~5.3.1 Principal Uses Permitted requiring a Coastal Development Permit per Chapter 10 (Discretionary Permits and Procedures):~~

~~1. Detached and attached single --family dwellings (one dwelling per building site).~~

~~2. Multi --family developments per Orange County Zoning Code Section 7-9-146.7, except not within three hundred (300) feet of the southerly curbline of Los Patos Avenue.~~

~~3. Community care facilities per Orange County Zoning Code Section 7-9-141.~~

~~4. Community facilities per Section 6.2.1.~~

~~5. Local parks per Chapter 6 and Orange County Local Park Code, Section 7-9-500.~~

~~6. Accessory Permitted Uses referenced in Section 5.3.2 when located on a separate building site.~~

~~5.3.2 Principal Permitted Uses requiring a Coastal Development Permit approved by the Planning Commission per Chapter 10 (Discretionary Permits and Procedures):~~

~~1. Residential Planned Developments, including patio home developments, per Zoning Code Section 7-9-110.~~

~~2 Community facilities per Section 6.2.2.~~

~~3. Any other use which the Planning Commission finds consistent with the purpose and intent of these regulations.~~

~~5.3.3 Accessory Uses Permitted~~

~~Accessory uses and structures are permitted when customarily associated with and subordinate to a Principal Permitted Use on the same building site, per Orange County Zoning Code Section 7-9-137, including:~~

~~1. Garages and carports, including access driveways and private streets.~~

~~5. Detached accessory structures such as greenhouses, gazebos, cabanas, and storage sheds.~~

~~6. Swimming pools, spas, therapy baths, water fountains, and related equipment.~~

~~7. Covered patios and decks.~~

~~8. Fences and walls.~~

~~9. Tennis courts, parks, trails, greenbelts, and similar common landscape areas.~~

~~10. Signs per Chapter 8, Sign Regulations.~~

~~8. Any other accessory use which the Director, EMA, finds to be consistent with the purpose and intent of these regulations.~~

~~5.3.4 Temporary Uses Permitted~~

~~Temporary uses are permitted subject to the requirements of Orange County Zoning Code Section 7-9-136, "Temporary Uses and Structures."~~

~~5.3.5 Prohibited Uses~~

~~11. Commercial uses and structures.~~

~~12. Industrial and manufacturing uses and structures, except those related to oil production per Section 5.2.2 and Chapter 9, Oil Production Regulations.~~

~~13. The storage of vehicles, equipment, or products related to a commercial activity not permitted in this area.~~

~~14. The keeping of pets or animals for any commercial purpose.~~

~~15. Apiaries.~~

~~6. Uses not provided for by Section 5.3.1 through 5.3.3 shall be prohibited; however, certain permitted uses are generally defined and may require interpretation by the Director, EMA per Orange County Zoning Code, Section 7-9-20.~~

~~5.3.6 Site Development Standards~~

~~The Site Development Standards contained in Section 5.5 shall apply to all development within this residential category.~~

~~5.4 MEDIUM-HIGH DENSITY RESIDENTIAL PLANNING AREAS~~

~~Medium-High Density Residential Planning Areas 6 and 8 provide for predominantly planned unit developments and multi-family developments, while also permitting single-family detached and single-family attached housing. Recreation uses, community facilities, and other uses accessory to a principal use are also allowed.~~

~~5.4.1 Principal Uses Permitted~~

~~1. Principal Permitted Uses requiring a Coastal Development Permit per Chapter 10 (Discretionary Permits and Procedures):~~

~~a. Detached and attached single-family dwellings (one dwelling per building site).~~

~~b. Multi-family developments per Orange County Zoning Code Section 7-9-146.7.~~

~~c. Community facilities per Section 6.2.1.~~

~~d. Community care facilities/homes per Orange County Zoning Code Section 7-9-141.~~

~~e. Local parks per Chapter 6 and Orange County Local Park, Code Section 7-9-500.~~

~~f. Accessory Permitted Uses referenced in Section 5.4.2, when located on a separate building site.~~

~~**2. Principal Permitted Uses requiring a Coastal Development Permit approved by the Planning Commission per Chapter 10 (Discretionary Permits and Procedures):**~~

~~a. Residential Planned Developments, including patio home developments, per Orange County Zoning Code Section 7-9-110.~~

~~b. Neighborhood Commercial facilities within Planning Area 6 (i.e., at the southwest corner of Warner Avenue and the Mesa Connector) per Orange County Zoning Code Section 7-9-89, limited to the following principal permitted uses:~~

~~i. Commercial recreation facilities including athletic clubs, tennis clubs, and their ancillary retail sales and/or dining areas.~~

~~ii. Retail and service businesses.~~

~~iii. Restaurants/cafes.~~

~~iv. Visitor-serving food concession facilities (mobile or permanent).~~

~~c. Community facilities per Section 6.2.2.~~

~~d. Any other use which the Planning Commission finds consistent with the purpose and intent of this land use category.~~

~~5.4.2 Accessory Uses Permitted~~

~~Accessory uses and structures are permitted when customarily associated with and subordinate to a Principal Permitted Use on the same building site, per Orange County Zoning Code Section 7-9-137, including:~~

~~1. Garages and carports, including access driveways and private streets.~~

~~2. Detached accessory structures such as greenhouses, gazebos, cabanas, and storage sheds.~~

3. ~~Swimming pools, spas, therapy baths, water fountains, and related equipment.~~

4. ~~Covered patios and decks.~~

5. ~~Fences and walls.~~

6. ~~Tennis courts, parks, trails, greenbelts, and similar common landscape areas.~~

7. ~~Signs per Chapter 8, Sign Regulations.~~

8. ~~Any other accessory use which the Director, EMA, finds to be consistent with the purpose and intent of these regulations.~~

~~5.4.3 Temporary Uses Permitted~~

~~Temporary uses are permitted, subject to the requirements of Orange County Zoning Code Section 7-9-136, "Temporary Uses and Structures."~~

~~5.4.4 Prohibited Uses~~

1. ~~Industrial and manufacturing uses and structures, except those related to oil production per Section 5.4.2 and Chapter 9, Oil Production Regulations.~~

2. ~~The storage of vehicles, equipment, or products related to a commercial activity.~~

3. ~~The keeping of pets or animals for any commercial purpose.~~

4. ~~Apiaries.~~

5. ~~Industrial and manufacturing facilities.~~

6. ~~Uses not provided for by Section 5.4.1 through Section 5.4.3 shall be prohibited; however, it is recognized that certain permitted uses are only generally defined and may require interpretation by the Director, EMA per Orange County Zoning Code, Section 7-9-20.~~

~~5.4.5 Site Development Standards~~

~~The Site Development Standards contained in Section 5.5 shall apply to all development within this residential category.~~

5.2 HIGH DENSITY RESIDENTIAL PLANNING AREAS

The Residential Planning Areas provide for predominantly single-family detached, single-family attached, and duplex housing. Residential planned unit developments, other multi-family developments, recreation uses, community facilities, and other uses accessory to a principal use are also allowed.

5.2.1 The Principal Permitted Use:

Detached and attached single-family dwellings (one dwelling per building site) or Multi-family developments per Orange County Zoning Code Section 7-9-146.7.

5.2.2 Other Permitted Uses:

1. ***Residential Planned Developments, including patio home developments, per Zoning Code Section 7-9-110.***

2. ***Community facilities.***

3. ***Local parks per Chapter 6 and Orange County Local Park Code, Section 7-9-500.***

4. ***Community care facilities per Orange County Zoning Code Section 7-9-141.***

5. ***Accessory Permitted Uses referenced in Section 5.2.3 when located on a separate building site.***

6. ***Home occupations per Orange County Zoning Code Section 7-9-163.3***

7. ***Any other use consistent with the purpose and intent of these regulations and which is consistent with all applicable policies of this LCP.***

5.2.3 Accessory Uses Permitted

Accessory uses and structures are permitted when customarily associated with and subordinate to a Principal Permitted Use on the

same building site, per Orange County Zoning Code Section 7-9-137, including:

1. Garages and carports, including access driveways and private streets.

2. Detached accessory structures such as greenhouses, gazebos, cabanas, and storage sheds.

3. Swimming pools, spas, therapy baths, water fountains, and related equipment.

4. Covered patios and decks.

5. Fences and walls.

6. Tennis courts, parks, trails, greenbelts, and similar common landscape areas.

7. Signs per Chapter 8, Sign Regulations.

8. Any other accessory use consistent with the purpose and intent of these regulations and which is consistent with all applicable policies of this LCP.

5.2.4 Temporary Uses Permitted

Temporary uses are permitted, consistent with the purpose and intent of these regulations and which is consistent with all applicable policies of this LCP

5.2.5 Prohibited Uses

1. ***Industrial and manufacturing uses and structures, except those related to oil production per Chapter 9, Oil Production Regulations.***

2. ***The storage of vehicles, equipment, or products related to a commercial activity.***

3. ***The keeping of pets or animals for any commercial purpose.***

4. ***Apiaries.***

5. ***Commercial uses and structures.***

6. ***Uses not provided for by Section 5.2.1 through Section 5.2.3 shall be prohibited.***

5.2.6 Site Development Standards

The Site Development Standards contained in Section 5.5 shall apply to all development within this residential category.

5.5 SITE DEVELOPMENT STANDARDS ~~(ML AND MH PLANNING AREAS)~~

5.5.1 Single-Family Detached Developments:

1. **Building site area:** Three thousand (3,000) square feet minimum.

2. **Building site width:** Thirty (30) feet minimum.

3. **Building height:** Thirty-five (35) feet maximum.

4. **Building site coverage:** ~~Fifty~~ ***Sixty*** percent ~~(50%)~~ ***(60%)*** maximum.

5. **Building setbacks:**

a. Front -- For single-family detached units located on through-travel streets, a minimum ten (10) feet from the property line, except garages and carports. The point of vehicular entry to a garage or carport shall be eight feet or less, or eighteen (18) feet or more from the street right-of-way. For each unit that contains a driveway of less than eighteen (18) feet, one (1) additional on-street-parking space shall be provided within three hundred and fifty (350) feet of the unit.

b. Side -- Minimum ten (10) feet aggregate for both sides. In those instances where a side yard is adjacent to a street, a five (5) foot minimum setback is required.

c. Rear -- Fifteen (15) feet minimum.

d. Bolsa Chica Mesa -- A minimum one-hundred (100) foot buffer shall be maintained inland from the edge of the Bolsa Chica Mesa or ESHA areas. A minimum fifty (50) buffer shall be maintained inland from the top edge of the upper mesa. These buffers are described in Land Use Plan Policy 3.1.2.12.

6. **Parking:** Off-street parking shall be provided per Chapter 7, Off-Street Parking Regulations, with an additional two-tenths (0.2) of a parking space for visitors for each single-family detached lot less than thirty-five (35) feet in width.

7. **Patios:** No attached or detached covered patio will be closer than three (3) feet to a property line, except the street-side property line of a corner lot where a minimum of eight (8) feet will be maintained.

8. **Projections into required setbacks:** Eaves, cornices, chimneys, outside staircases, balconies, and similar architectural features may project a maximum of six (6) feet into any required lot setback or three (3) feet from the property line.

9. **Fence/wall heights:** Maximum height for fences and walls will be in accordance with Orange County Zoning Code Section 7-9-137.5, except as otherwise permitted below, provided that sight distances for vehicular safety are not obstructed:

a. Where main buildings may be located -- the same as the main building height.

b. Within required front setback area -- forty-two (42) inches.

c. Within other setback areas -- six (6) feet. Higher walls for the purpose of noise mitigation or other health and safety measures may be approved by the Director, ~~EMA~~ ***PDSD***, subject to approval of an acoustical analysis report***, only if such fences can be found consistent with all visual resource policies and standards of the certified LCP.***

10. Lights: All lights shall be designed and located so that direct light rays shall be confined to the premises.

11. Landscaping: Lots located adjacent to any areas designated as buffer, Conservation, or Open Space and Recreation shall provide drought tolerant non-invasive landscaping on the portion facing the open space area to soften the visual impact on the public use area.

5.5.2 Single-Family Attached Developments:

1. **Building site area:** Two thousand five hundred (2,500) square feet minimum.

2. **Building site width:** Thirty (30) feet minimum.

3. **Building height:** Thirty-five (35) feet maximum. Architectural projections, appropriately screened mechanical units, chimneys and elevators that do not exceed ten (10) percent of the roof area, nor exceed the height limit by more than eight (8) feet will be permitted.

4. **Building coverage:** No maximum.

5. **Building setbacks**:

a. Front -- For single-family attached units located on through travel streets, fifteen (15) feet from the property line, except garages and carports. The point of vehicular entry to a garage or carport shall be a distance of eight (8) feet or less, or eighteen (18) feet or more from the street right-of-way. For each unit that contains a driveway of less than eighteen (18) feet, one (1) additional on- or off-street parking space shall be provided within three hundred and fifty (350) feet of the unit.

b. Street side -- Ten (10) feet minimum from the face of curb.

c. Side -- Five (5) feet minimum.

d. Rear -- Ten (10) feet minimum.

e. Bolsa Chica Mesa -- A minimum one-hundred (100) foot buffer shall be maintained inland from the edge of the Bolsa Chica Mesa or ESHA areas. A minimum fifty (50) buffer shall be maintained inland from the top edge of the upper mesa. These buffers are described in Land Use Plan Policy 3.1.2.12.

6. **Parking:** Off-street parking will be provided per Chapter 7, Off-Street Parking Regulations.

7. **Patios:** No attached or detached covered patio will be located closer than three (3) feet to a property line except the street-side property line of a corner lot, in which case a minimum distance of five (5) feet will be maintained.

8. **Projections into required setbacks:** Eaves, cornices, chimneys, outside staircases, balconies and similar architectural features may project a maximum of four (4) feet into any required lot setback or three (3) foot from the property line.

9. **Fence/wall heights:** Maximum height for fences and walls per Orange County Zoning Code Section 7-9-137.5, except as otherwise permitted below, provided that sight distances for vehicular safety purposes are not obstructed:

a. Within areas where main buildings may be located -- eight (8) feet.

b. Within required front setback area -- six (6) feet.

b. Within other setback areas -- six (6) feet. Higher walls for the purpose of noise mitigation or other health and safety measures may be approved by the Director, ~~EMA~~ ***PDSD*** subject to approval of an acoustical analysis***, only if such fences can be found consistent with all visual resource policies and standards of the certified LCP***.

10. Lights: All lights shall be designed and located so that direct light rays shall be confined to the premises.

11. Landscaping: Lots located adjacent to any areas designated as buffer, Conservation, or Open Space and Recreation shall provide drought tolerant non-invasive landscaping on the portion facing the open space area to soften the visual impact on the public use area.

5.5.3 Multi-Family Developments:

1. **Building Site Area:** Three thousand (3,000) square feet minimum.

2. **Area per unit:** One thousand (1,000) square feet minimum net land area per dwelling unit.

3. **Building site width:** No minimum.

4. **Building height:** Forty-five (45) feet maximum~~, except that development within one hundred and fifty (150) feet of Outer Bolsa Bay (Planning Area 1C) shall not exceed thirty-five (35) feet maximum~~. Architectural projections, appropriately screened mechanical units, chimneys and elevations that do not exceed ten (10) percent of the roof area, nor exceed the height limit by more than eight (8) feet will be permitted.

5. **Building site coverage:** No maximum.

6. **Building setbacks/separations:**

   a. Building Setback Along Project boundary -- Ten (10) feet minimum.

   b. Building separation for buildings thirty-five (35) feet and less in height -- Ten (10) feet minimum.

   c. Building separation for buildings greater than thirty-five (35) feet in height -- Fifteen (15) feet minimum.

   d. Bolsa Chica Mesa -- A minimum one-hundred (100) foot buffer shall be maintained from the edge of the Bolsa Chica Mesa, wetlands or ESHA areas as described in Land Use Plan Policy 3.1.2.12. The buffer separating the lower bench from the upper bench shall extend from the edge, fifty (50) feet into the upper bench.

7. **Garage and carport placement:** The point of vehicular entry to a garage or carport shall be eight (8) feet or less, or eighteen (18) feet or more, from the property line.

8. **Patios:** No attached or detached covered patio will be located closer than three (3) feet to a property line except the street-side property line of a corner lot, in which case a minimum distance of ~~eight (8)~~ ***five (5)*** feet will be maintained.

9. **Projections into required setbacks:** Eaves, cornices, chimneys, outside staircases, balconies and similar architectural features may project six (6) feet into any required lot setbacks; except where the setback is six (6) feet or less. In that case, the projection shall be permitted, but not less than, within three (3) feet of the property line.

10. **Parking:** Off-street parking shall be provided per Chapter 7, Off-Street Parking Regulations.

11. **Maximum height for fences:** Six (6) feet, provided that sight distances for vehicular safety purposes are not obstructed. Higher walls for the purpose of noise mitigation or other health and safety measures shall be approved by the Director, ~~EMA~~ ***PDSD*** subject to approval of an acoustical analysis report***, only if such fences can be found consistent with all visual resource policies and standards of the certified LCP.***

12. **Open space:** Minimum of five (5) percent of the net area of a Development Area shall be reserved as usable open space. The following elements will not be counted in computing the usable open space: streets, common driveways, slopes greater than 2.5:1 incline, and any property not reserved for the sole use and enjoyment of the occupants of the project and their guests.

13. **Trash and storage areas:** All trash and storage, including cartons or containers, shall be shielded from view within a building or area enclosed by a wall not less than six (6) feet in height.

14. **Screening:**

    a. Abutting single-family detached residential areas -- A screen will be installed to buffer multiple-family developments from abutting single-family detached residential areas. Except as otherwise provided, screening will have a total height of not less than five (5) feet and not more than seven (7) feet. Where there is a difference in

elevation on opposite sides of the screen, the height will be measured from the highest point of elevation.

b. Parking areas abutting arterial highways -- An opaque screen will be installed along all parking areas abutting arterial highways. Except as otherwise provided, screening other than landscaping will have a total height of not less than three (3) feet and not more than six (6) feet.

c. Notwithstanding the requirements listed herein, where the finished elevation of the property at the boundary line, or within five (5) feet inside the boundary line, is higher or lower than an abutting property elevation, such change in elevation may be used in lieu of, or in combination with, additional screening to satisfy the screening requirements of this Section.

d. A screen, as previously referenced, shall consist of one or any combination of the following:

i. Walls, including retaining walls: A wall shall consist of concrete, stone, brick, tile or similar type of solid masonry material a minimum of four (4) inches thick.

ii. Berms: A berm shall be constructed of earthen materials and shall be landscaped.

iii. Solid fences: A solid fence shall be constructed of wood or other materials a minimum nominal thickness of one (1) inch, and shall form an opaque screen.

iv. Landscaping: Vegetation consisting of evergreen trees and/or shrubs. ***Lots located adjacent to any areas designated as buffer, Conservation, or Open Space and Recreation shall provide drought tolerant non-invasive landscaping on the portion facing the open space area to soften the visual impact on the public use area.***

15. **Lights:** All lights shall be designed and located so that rays are aimed at the site.

~~5.5.4 Neighborhood Commercial Developments~~

~~Permitted neighborhood commercial uses shall be developed in accordance with the site development standards set forth in Orange County Zoning Code, Section 7-9-89.7.~~

6. PUBLIC FACILITIES REGULATIONS AND STANDARDS

6.1 PURPOSE AND INTENT

Planning Areas designated exclusively for Public Facilities on the Planned Community Development Map and Statistical Table include***s*** the ~~EGGW Flood Control Channel (PA 4A), a~~ water reservoir site (PA 4B)~~,~~ and a ***school site*** ~~fire station site (PA 4C)~~. Other public and community facilities may be located within Residential and Recreation Planning Areas as identified in Chapters 4 and 5.

6.2 PRINCIPAL PERMITTED USES

6.2.1 *The* Principal Permitted *Use* ~~Uses Requiring a Coastal Development Permit per Chapter 10 (Discretionary Permits and Procedures)~~:

~~1. Public Facilities designated on the Planned Community Development Map and Statistical Table, including:~~

~~a. Public Mesa and Lowland Community Parks.~~
~~b. Public water storage reservoir.~~
~~c. Public EGGW Flood Control Channel.~~

~~2. Other Public and Community Facilities, including:~~

~~a. Public and private neighborhood parks.~~
~~b. Public and private recreation centers and facilities, including swimming pools, tennis courts, and clubhouses.~~
~~c. Public riding, hiking, and bicycle trails.~~
~~d. Security and maintenance facilities and structures, including entry kiosks, and gates related directly to an individual residential project, homeowners association, or the community.~~

The principal permitted use with regards to public facilities shall be public park including active and passive park use and wetland buffer use pursuant to the provisions of Chapter 4, Recreation Planning Areas Regulations and Standards.

6.2.2 ~~Principal~~ ***Other*** Permitted Uses ~~Requiring a Coastal Development Permit approved by the Planning Commission per Chapter 10 (Discretionary Permits and Procedures)~~:

1. Places of religious worship***, except within Open Space and Recreation Planning Areas***.

2. Schools (public and private ***except within Open Space and Recreation Planning Areas***.

3. Public and private day care centers and nursery schools***, except within Open Space and Recreation Planning Areas***.

4. Congregate care facilities***, except within Open Space and Recreation Planning Areas***.

5. Public utility buildings, structures, and facilities, including electrical, water, sewage, drainage, telephone and telegraph, cable TV, and other similar services and infrastructure, and their storage, distribution, treatment, and/or production facilities. ***Any such facilities allowed within the Open Space and Recreation Planing Areas shall be consistent with policies 6.2.13 and 6.2.14 of the Development Component of the LUP***.

6. Communication equipment buildings such as transmitters, antennae, towers, cable relay stations, and satellite and radar dishes. ***Any such facilities allowed within the Open Space and Conservation planning areas shall be consistent with policies 6.2.13 and 6.2.14 of the Development Component of the LUP***.

7. Public safety and civic facilities, including:

   a. Fire stations, ***only within Residential Planning Areas***.
   b. Police stations, ***only within Residential Planning Areas or within Harriett Wieder Regional Park***.
   c. Post offices, ***only within Residential Planning Areas***.

8. Water storage reservoir on the upper bench of the Bolsa Chica Mesa.

9. Public and private neighborhood parks, except that private parks shall be prohibited in all Open Space and Recreation Planning Areas.

10. Public and private recreation centers and facilities, including swimming pools, tennis courts, and clubhouses, except that private recreation centers and facilities shall be prohibited in all Open Space and Recreation Planning Areas.

11. Public riding, hiking, and bicycle trails.

12. Security and maintenance facilities and structures, including entry kiosks, and gates related directly to an individual residential project, homeowners association, or the community. Except that no security or maintenance facility, including but not limited to entry kiosks or gates in support of private residential development shall be located within any Open Space and Recreation Planning Area nor interfere with public use of the Mesa bluff edge scenic road.

13. Any other community facility use ~~found by the Planning Commission to be~~ consistent with this Chapter ***and with all applicable policies of this LCP***.

6.3 SITE DEVELOPMENT STANDARDS

6.3.8 Landscaping: Landscaping consisting of evergreen or deciduous trees, shrubs, and groundcover, shall be installed and maintained subject to the following standards:

1. Boundary landscaping is required to be consistent with the underlying landscape zone identified on the Master Landscape Concept Plan contained in the Bolsa Chica LCP Land Use Plan.

2. In addition to boundary landscaping, at least five (5) percent of the net area of a project is required to be landscaped, with a minimum of twenty-five (25) percent of such landscaping located in the parking area unless otherwise approved by a Coastal Development Permit.

3. Any landscaped area shall be separated from an adjacent vehicular area by a wall or curb at least four (4) inches higher than the adjacent vehicular area or shall in some other manner be protected from vehicular damage.

4. Permanent automatic irrigation facilities shall be provided for all landscaped areas. ***However, permanent automatic irrigation shall not be used within buffer areas, wetlands or ESHA areas as the landscaping in these areas shall consist of native drought tolerant vegetation.***

5. All landscaping shall be maintained in a neat, clean, and healthy condition. This shall include pruning, mowing, weeding, removing litter, fertilizing, replacing plants when necessary, and regular watering of all plantings.

6. Landscaping adjacent to areas designated as Conservation or Open Space and Recreation shall consist of native plants. Non-native plants which are invasive and which would supplant native plants shall not be used.

7. OFF-STREET PARKING REGULATIONS

7.1 PURPOSE AND INTENT

These regulations provide for and govern the off-street parking of motor vehicles within the Bolsa Chica Planned Community. These regulations will result in parking facilities of sufficient capacity to manage traffic congestion, ***promote coastal access, public parking,*** provide safe and convenient facilities for motorists and pedestrians, and provide joint-use or shared parking programs where appropriate.

7.3 STANDARDS FOR INDIVIDUAL PRINCIPAL USES

The following standards delineate the minimum number of parking spaces required for individual principal uses:

1. ***Local parks/ recreation areas*** On-street and/or off-street parking for local parks and recreation uses shall be provided pursuant to the requirements of the Orange County ~~EMA C Harbors, Beaches and Parks~~, and Orange County Zoning Code Section 7-9-145~~, or approval of the Director, Orange County HBPD~~.

7.4 JOINT-USE OR SHARED PARKING

A reduction in the aggregate total of otherwise required parking spaces for principal uses within a mixed-use development may be permitted for either joint-use or shared parking upon the approval of a Detailed Parking Plan by the Zoning Administrator or Planning Commission in conjunction with a Coastal Development Permit or Use Permit. The approval of a parking reduction due to joint-use or shared parking shall be based on the following findings:

1. Such modification shall not have a negative impact on parking for residential~~, neighborhood commercial,~~ or public recreational uses; and

~~7.5 EXCEPTIONS AND/OR MODIFICATIONS TO OFF-STREET PARKING REQUIREMENTS~~

~~The provisions of this Chapter and Orange County Zoning Code Section 7-9-145 are intended to meet the off-street parking needs for all uses allowed in the Bolsa Chica Planning Community. Where, because of the nature of the use involved or other relevant circumstances, the requirements of this Chapter are considered to be excessive, an exception and/or modification to these provisions and those of Orange County Zoning Code Section 7-9-145 may be~~

~~approved in accordance with the following procedure, provided such exception and/or modification is consistent with the purpose and intent of this Chapter:~~

~~1. Any property owner, an authorized agent, or a public agency may apply for an exception to, or modification of, the off-street parking requirements set forth in this Chapter and/or Section 7-9-145 of the Orange County Zoning Code.~~

~~2. Exceptions and/or modifications to off-street parking requirements set forth in this Chapter and/or Orange County Zoning Code Section 7-9-145 shall be permitted subject to the approval of a Coastal Development Permit or Use Permit per Chapter 10 (Discretionary Permits and Procedures).~~

~~3. Coastal Development Permits or Use Permits which include a request for an exception to, or modification of, off-street parking requirements shall be processed in accordance with the provisions of Chapter 10 (Discretionary Permits and Procedures).~~

8. SIGN REGULATIONS

8.1 PURPOSE AND INTENT

This Chapter established standards for the uniform regulation of signs throughout the Bolsa Chica Planned Community. These regulations are intended to produce a consistency in sign design that reinforces the collective image of the Planned Community, while ***informing the public of the recreation amenities available within the LCP area,*** and maintaining flexibility for individual identification needs. All signs are to be designed, built, and installed according to the requirements set forth in this Chapter.

8.2 PERMITTED SIGNS

8.2.1 Freestanding (monument) signs:

1. In addition to the requirements of Chapter 10, applications for free-standing ground (monument) signs shall be accompanied by scale drawings indicating the size, sign copy, colors, method and intensity of illumination, height, sign area and general location of all signs on the building site. One (1) identification free-standing ground sign may be permitted as accessory to a main use for each building site ***or public recreation area*** with a street frontage in excess of ninety-nine (99) feet. Where the building site abuts more than one (1) street, one (1) additional such identification sign is permitted on each additional street frontage that is in excess of ninety-nine (99) feet in length. In no case shall more than one (1) such sign on each street frontage for each building site be permitted.

8.2.3 Sign Programs:

1. A Sign Program is intended to encourage innovation and latitude in order to achieve variety and an appropriate design. A Sign Program shall comprehensively cover an area within the Planned Community~~, and may be approved which establishes Alternative Development Standards subject to justification requirements noted in Section 10.4.8~~.

4. A comprehensive signage program for all public access/visitor-serving recreation facilities shall be provided and implemented with the construction of these facilities, and shall inform the public of the availability of, and provide direction to, the on-site recreation amenities of the Bolsa Chica LCP area.

5. Signs within Open Space and Recreation, Public Facility, and Conservation Planning Areas shall be designed so they are only a minor visual element essential for public safety, welfare, convenience, and to inform the public of the availability of the public recreational amenities.

9. OIL PRODUCTION REGULATIONS

9.2 PURPOSE AND INTENT

The purpose of these regulations is to provide for continued oil production within the Bolsa Chica Planned Community under existing leases and until abandoned due to natural depletion of the recoverable oil or by early abandonment. Early abandonment may be pursued to facilitate implementation of ~~the Wetlands Restoration Program~~ ***wetlands restoration***.

Closure of the oil wells, removal of pipelines and facilities, and cleanup of the surface soil and contaminants shall be regulated by the California Department of Conservation, Division of Oil and Gas (CDOG) and ~~the Director of the Orange County Environmental Management Agency (OCEMA)~~ ***Director, Planning and Development Services Department (PDSD)*** as set forth in this Chapter.

9.3 ABANDONMENT OF OIL WELLS ~~PRODUCTION REGULATIONS~~ WITHIN RESIDENTIAL AND PUBLIC FACILITY PLANNING AREAS

~~Except as otherwise specified in this Section 9.3, continuing oil production and the~~ ***The*** abandonment of wells and facilities within Residential and Public Facility Planning Areas of the Bolsa Chica Planned Community shall be in accordance with the following laws and regulations:

~~In addition to these regulations, oil production activities are subject to the provisions of leases and agreements between the oil operator and the surface landowner, which are not enforceable by the County of Orange.~~

~~The following additional regulations shall apply to Residential and Public Facility Planning Areas upon recordation of a Final Tract Map for all or a portion of that Planning Area. Responsibility for implementation of these regulations shall belong to the Tract Map applicant unless specified as the responsibility of the oil operator.~~

9.3.1 Oil Well Abandonment

All oil well abandonments, excavation and remediation of contaminated soils shall be performed in accordance with the following requirements.

- ***Closure of oil wells, removal of pipelines and facilities shall be in compliance with the requirements of the California Department of Conservation, Division of Oil, Gas, and Geothermal Resources.***

- ***Cleanup of surface soil and contaminants shall be in compliance with the requirements of the California Department of Toxic Substance Control, Site Mitigation Branch; and (as required) the California Regional Water Quality Control Board, Santa Ana Region.***
- ***When a well site is abandoned, all improvements on the site shall be removed and the site shall be restored to its natural condition as it existed before oil development occurred.***
- ***Adequate screening, setbacks, and aesthetic treatments shall be provided to minimize hazards and nuisances posed by the proximity of oil operations.***
- ***Any oil related development shall be undertaken in accordance with the requirements of the California Department of Conservation, Division Oil, Gas, and Geothermal Resources Guidelines regarding specifications and standards for oil-related activities, well abandonments, and reabandonments.***

~~9.3.1 Requirements for New Drilling and Major Redrilling~~

~~New drilling of oil wells is regulated by the State of California and the County of Orange pursuant to the codes and statutes identified above. With respect to the SOVI operations only, however, the number of new wells and the location of these wells are also subject to the provisions of any leases and/or agreements entered into between the surface landowner and the oil operator.~~

~~No new drilling or major redrilling shall be allowed within any residential tract map subdivision area or public facility lot after the County issues the first Certificate of Occupancy for a residential unit within that subdivision.~~

~~9.3.2 Required Setbacks~~

~~All residential structures shall be located a minimum of fifty (50) feet from any producing well (pursuant to Orange County Fire Department requirements) and at least ten (10) feet from and/or ten (10) feet above any abandoned oil well casing. The surface landowner shall provide a minimum 20 feet by 50 feet well site for existing wells with an access of 50 feet by 150 feet upon request by the Oil Operator. The setback of the oil well from the street shall be the width of the street plus the depth needed to provide a total of 150 feet access.~~

~~9.3.3 Production Equipment Operations~~

~~All production equipment shall be constructed and operated by the oil operator so that noise, vibration, lights, dust, odor or other harmful or annoying~~

~~substances or effects are reduced to the maximum extent feasible. Technological improvements in production methods shall be incorporated and utilized by the oil operator as they become available in order to reduce the adverse effects identified previously. All production equipment shall be maintained in a safe and clean operating condition.~~

~~9.3.4 Production Regulations for Oil Operators~~

1. ~~No water or oil storage tanks or other shipping facilities shall be permitted on the well sites.~~

2. ~~No sign shall be constructed, erected, maintained, or placed on the premises or any part thereof, except those required by law or ordinance to be displayed in connection with oil field operations.~~

3. ~~All liquids and gases produced shall be removed from the site by underground pipelines.~~

4. ~~All production units, injection wells, electrical pumps, and filters shall be contained in a 20- by 50-foot enclosed area.~~

5. ~~No heater treaters or other burning of natural gas or venting of natural gas to the atmosphere shall be conducted on the well site.~~

6. ~~Shrubs shall be planted and maintained along the exterior of fences and/or walls enclosing well sites (Figure 9.1). This regulation shall not limit additional landscaping requirements which may be imposed as a condition of a Coastal Development Permit, and/or Tentative Tract Map.~~

~~9.3.5 Fences~~

~~All oil operation sites shall be completely enclosed by a chain link fence with the following specifications:~~

1. ~~All chain link fence enclosures shall have a minimum height of six (6) feet, topped with three (3) strands of barbed wire, spaced four (4) inches apart.~~

2. ~~The chain link fabric shall be a minimum of eleven (11) gauge galvanized steel and may be coated with vinyl or plastic material.~~

3. ~~There shall be no opening below the fence greater than four (4) inches.~~

4. ~~Support posts shall be set in concrete and shall be imbedded in the ground to a depth sufficient to maintain the stability of the fence as approved by the County Building Inspector, but in no event less than twelve (12) inches.~~

5. ~~Fencing constructed of individual chain link panels shall be securely latched, pinned, or hinged to prevent unauthorized persons from gaining access to such operation site.~~

~~9.3.6 Masonry Walls~~

~~In conjunction with approval of a Coastal Development Permit, and/or Tentative Tract Map for development within a Residential or Public Facility Planning Area, masonry walls may be required to enclose in whole or in part any oil well site and/or oil operation site that lies within the area covered by the permit and/or map. If required through a permit or Tract Map approval, and unless otherwise specified as a condition of approval, the masonry walls shall be sited and constructed in accordance with standard engineering practices and the following specifications:~~

1. ~~The design and color of the wall shall be compatible with the facilities, buildings and structures adjacent to the wall.~~

2. ~~The wall shall be at least ten (10) feet in height.~~

3. ~~The wall shall be constructed in accordance with the provisions of the Orange County Building Code.~~

~~9.3.7 Required Gates~~

~~All fences and masonry walls shall be equipped with at least one gate section. Unless otherwise specified as a condition of approval, the gate section shall meet the following specifications:~~

1. ~~Each gate section shall be twelve (12) feet wide and be composed of two (2) gates, each of which is six (6) feet wide, or one sliding gate twelve (12) feet wide. The gates shall latch and lock in the center of the twelve (12) foot span, and each gate shall be topped with three (3) strands of barbed wire, spaced four (4) inches apart.~~

2. ~~The gates shall be of chain link construction which meets the applicable specifications or of other approved materials which, for safety reasons, shall be at least as secure as chain link fence.~~

~~3. The gates shall be provided with a combination catch and locking attachment device for a padlock, and shall be kept locked except when being used for access to the site.~~

~~4. Hinges shall be heavy-duty malleable iron or steel industrial service type with a 180 degree swing. Sliding gates must be made of heavy- duty malleable iron or steel industrial-service type.~~

~~5. There shall be at least one gate opening for access, placed in a non-hazardous position, and such gate(s) shall be locked at all times while left unattended by a watchman or serviceman.~~

~~9.3.8 Oil Field Waste Removal~~

~~Rotary mud, drill cuttings, oil and liquid hydrocarbons, and all other oil field wastes derived or resulting from, or connected with the redrilling or reworking of any well, shall be discharged and removed from the operation site by the oil operator according to all applicable Federal, State, and County Regulations.~~

~~9.3.9 Off-Street Parking~~

~~Parking for oil facility employees shall be provided on-site per Chapter 7, Off-Street Parking Regulations.~~

9.4 OIL PRODUCTION REGULATIONS WITHIN CONSERVATION AND RECREATION PLANNING AREAS

Except as otherwise provided in this Section 9.4, continuing oil production and the abandonment of wells and facilities within the Conservation and Recreation Planning Areas of the Bolsa Chica Planned Community shall be in accordance with the following laws and regulations:

- State of California Department of Conservation Division of Oil, Gas and Geothermal Resources Laws for the Conservation of Petroleum and Gas;
- ~~Orange County Zoning Code Section 7-9-117; and~~
- ~~Orange County Oil Code Section 7-8-1 through 7-8-53.~~

~~In addition to these regulations, oil production activities are subject to the provisions of leases and agreements between the oil operator and the surface landowner which are not enforceable by the County of Orange.~~

~~When a Building Permit is issued for a residential dwelling unit or other habitable structure within one thousand (1,000) feet of any drill site, well site,~~

~~or production site within a Conservation or Recreation Planning Area, the following additional drilling and production regulations shall become effective for that well site, and shall be the responsibility of the Building Permittee to ensure their implementation prior to issuance of a Certificate of Occupancy unless specified as belonging to the oil operator.~~

9.4.1 Requirements for New Drilling and Major Redrilling

~~New drilling of oil wells is regulated as discussed under Section 9.3.1.~~ New drilling of oil wells is regulated by the State of California ~~and the County of Orange~~ pursuant to the codes and statutes identified above. ~~With respect to the SOVI operations only, however, the number of new wells and the location of these wells are also subject to the provisions of any leases and/or agreements entered into between the surface landowner and the oil operator~~.

9.4.2 Oil Well Abandonment

All oil well abandonments, excavation and remediation of contaminated soils shall be performed in accordance with the following requirements.

- ***Closure of oil wells, removal of pipelines and facilities shall be in compliance with the requirements of the California Department of Conservation, Division of Oil, Gas, and Geothermal Resources.***
- ***Cleanup of surface soil and contaminants shall be in compliance with the requirements of the California Department of Toxic Substance Control, Site Mitigation Branch; and (as required) the California Regional Water Quality Control Board, Santa Ana Region.***
- ***When a well site is abandoned, all improvements on the site shall be removed and the site shall be restored to its natural condition as it existed before oil development occurred.***
- ***Adequate screening, setbacks, and aesthetic treatments shall be provided to minimize hazards and nuisances posed by the proximity of oil operations.***
- ***Any oil related development shall be undertaken in accordance with the requirements of the California Department of Conservation, Division Oil, Gas, and Geothermal Resources Guidelines regarding specifications and standards for oil-related activities, well abandonments, and reabandonments.***

Graphic Suggested Modification: Figure 9.1 of the Planned Community Program which depicts the standards for screening oil wells adjacent to lowland residential development shall be deleted. Since this suggested modification refers to graphic

revision, once the graphic revisions are made, this suggested modification does not need to be included in the Planned Community Program text.

10. DISCRETIONARY PERMITS AND PROCEDURES

10.1 Purpose and Intent

~~Master~~ Coastal Development Permits~~, Area-wide Coastal Development Permits, and Project Coastal Development Permits~~ are intended to provide community and governmental representatives with the opportunity to review detailed plans for specific types of development projects within the Bolsa Chica Planned Community. ~~They also provide a method for establishing Alternative (Site) Development Standards for these projects~~.

Figure 10.1 summarizes the sequence of Coastal Development Permits described in this Bolsa Chica Planned Community Program.

Graphic Suggested Modification: Figure 10.1 of the Planned Community Program which depicts the County's coastal development permit process shall be deleted. Since this policy refers to graphic revision, once the graphic revisions are made, this suggested modification does not need to be included in the Planned Community Program text.

10.2 GENERAL REQUIREMENTS

10.2.1 Principal Permitted Uses

Land uses listed in this Planned Community Program as ~~Principal Permitted Uses~~ ***the Principal Permitted Use*** are considered to be within the category of "principal permitted use" under the County of Orange Zoning Code Section 7-9-118; ***and are not appealable to the Commission under*** ~~the California Coastal Act of 1976, in general; and~~ Public Resources Code Section 30603(a)(4)~~, in particular~~.

10.2.2 Coastal Development Permits in General

A coastal development permit shall be required for all development, as defined in Public Resources Code Section 30106, proposed to be undertaken in the coastal zone. All Coastal Development Permits shall be approved pursuant to Section 7-9-118, CD "Coastal Development" District Regulations, of the Orange County Zoning Code and as set forth in this

Planned Community Program, either by the Zoning Administrator or the Planning Commission.

Pursuant to Section 30519 of the Coastal Act, any development occurring on tidelands, submerged lands or public trust lands, requires that a coastal development permit be obtained from the California Coastal Commission. Coastal development permits shall also be obtained from the Coastal Commission for any proposed amendments to coastal development permits issued by the Coastal Commission. For all other development, coastal development permits shall be obtained from the County of Orange.

~~Any Coastal Development Permit which seeks to establish Alternative Development Standards must be processed in conformance with Subsection 10.3.3, Coastal Development Permits, and Subsection 10.3.4, Alternative Development Standards, of this Chapter.~~

10.2.3 COASTAL DEVELOPMENT PERMITS WITHIN CONSERVATION PLANNING AREAS

The purpose of the Conservation Land Use District is to implement the Bolsa Chica Land Use Plan; and provide for the protection, maintenance, restoration, and enhancement of wetlands and environmentally sensitive habitat areas located within the coastal zone while allowing for appropriate utilization to occur.

The application of the Conservation Land Use District is not intended to authorize, and shall not be construed as authorizing the County of Orange to exercise its power in a manner which will take or damage private property for public use. This zoning ordinance is not intended to increase or decrease the rights of any owner of property under the Constitution of the State of California or the United States.

10.2.3.1 REQUIRED CONSIDERATION OF ALTERNATIVES.

Before any application is accepted for development in a Conservation Land Use District is accepted for processing, the applicant shall provide topographic, vegetative, hydrologic and soils information prepared by a qualified professional and reviewed by the California Department of Fish and Game, which identifies the extent of the wetlands or environmentally sensitive habitat on the property. This submittal shall also include an analysis of alternatives to the proposed project and an

assessment of how the proposed project is the least environmentally damaging alternative. The analysis of alternatives shall include an assessment of how the proposed project will impact all adjacent wetlands and environmentally sensitive habitat areas including those within the overall development plan area.

10.2.3.2 REQUIRED PERMITS/AGREEMENTS.

Before an application for a coastal development in a Conservation Land Use District can be considered complete, the project shall receive the following State and Federal regulatory permits/agreements or a statement from the regulatory body that a permit/agreement is inapplicable. The required regulatory permits/agreements shall be forwarded to the Director PDSD prior to the submittal of said project to the decision making body.

a. United States Army Corps of Engineers Section 404 and/or Section 10 permits;
b. California Department of Fish and Game 1601-1603 agreements;
c. State Water Resources Control Board;
d. Regional Water Quality Control Board;
e. State Lands Commission

10.2.3.3 ECONOMICALLY VIABLE USE DETERMINATION

1. Designation of the Project Area.

Development or subdivision of any parcel in whole or in part within the Conservation Land Use District shall be permitted only pursuant to an overall development plan for the entirety of all parcels that are geographically contiguous and in common ownership at the time of application. For purposes of determining common ownership pursuant to this section, parcels which are owned in fee, as well as parcels subject to existing purchase options, shall be treated as commonly owned. Consistent with Government Code section 66424, property shall be considered as contiguous pursuant to this Article even if separated by roads, streets, utility easements, or railroad rights of way.

2. Economically Viable Use Determination

a. Any applicant that proposes a use other than one permitted in the Conservation Land Use District based on the contention that the uses permitted in this district will not provide an economically viable use of his or her property shall apply for an economic viability determination in conjunction with their coastal development permit application. The application for an economic viability determination shall include the entirety of all parcels that are geographically contiguous and held by the applicant in common ownership at the time of the application. Before any application for a coastal development permit and economic viability determination is accepted for processing, the applicant shall provide the following information:

i. The date the applicant purchased or otherwise acquired the property and from whom.

ii. The purchase price paid by the applicant for the property.

iii. The fair market value of the property at the time the applicant acquired it, describing the basis upon which the fair market value is derived, including any appraisals done at the time.

iv. The general plan, zoning or similar land use designations applicable to the property at the time the applicant acquired it, as well as any changes to these designations that occurred after acquisition.

v. Any development restrictions or other restrictions on use, other than government regulatory restrictions described in (d) above that applied to the property at the time the applicant acquired it, or which have been imposed subsequent to acquisition.

vi. Any change in the size of the property since the time the applicant acquired it, including a discussion of the nature of the change, the circumstances and the relevant dates.

vii. A discussion of whether the applicant has sold or leased a portion of, or interest in, the property since the time of purchase, indicating the relevant dates, sales prices, rents,

and nature of the portion or interests in the property that were sold or leased.

viii. Any title reports, litigation guarantees or similar documents in connection with all or a portion of the property of which the applicant is aware.

ix. Any offers to buy all or a portion of the property which the applicant solicited or received, including the approximate date of the offer and offered price.

x. The applicant's costs associated with the ownership of the property, annualized for each of the last five calendar years, including property taxes, property assessments, debt service costs (such as mortgage and interest costs), and operation and management costs.

xi. Apart from any rent received from the leasing of all or a portion of the property, any income generated by the use of all or a portion of the property, any income generated over the last five calendar years. If there is any such income to report, it should be listed on an annualized basis along with a description of the uses that generate or has generated such income.

xii. Identification of any adjacent land owned by the applicant that was purchased and/or financed at the time of purchase of the parcel to be developed.

b. The decision making authority shall hold a public hearing on any application for an economically viable use determination. Prior to approving a coastal development permit for a use other than one provided for in the Conservation Land Use District the decision making authority shall make the following findings:

i. Based on the economic information provided by the applicant, as well as any other relevant evidence, each use provided for in the Conservation Land Use District would not provide an economically viable use of the applicant's property,

ii. Restricting the use of the applicant's property to the uses provided for in the Conservation Land Use District would interfere with the applicant's reasonable investment backed expectations.

The findings adopted by the decision making authority shall identify the evidence supporting the findings.

c. Where the decision making authority finds that the uses provided for in the Conservation Land Use District would not provide an economically viable use, and that restricting the use of the applicant's property to these uses would interfere with their reasonable investment backed expectations, other (alternative) uses provided for in the planned community district may be allowed as a conditional use. A specific development proposal may be denied, however, if a feasible less environmentally damaging alternative use would also provide the applicant with an economically viable use. In addition to the other performance standards of Section 10.2.3.4 applicable to the development, development projects in the Conservation Land Use District, shall be subject to the following development standards:

i. The area in which the alternative use shall be permitted shall be the minimum amount necessary to provide the applicant with an economically viable use of his or her property.

ii. The alternative use shall be subject to the policies and standards of the certified LCP for that use.

iii. Access through wetlands or environmentally sensitive habitat areas to an area proposed for the alternative use shall only be allowed, if necessary, to provide an economically viable use of the overall development plan area.

10.2.3.4 PERFORMANCE STANDARDS

Before the coastal development permit can be issued, development shall comply with the following standards to the satisfaction of the Director PDSD:

1. Wetlands and environmentally sensitive habitat areas that are designated for preservation after a permit hearing granting project approval on the property shall be preserved through a conservation easement, deed restriction or other similar mechanism consistent with Public Resources Code Section 30010. Such easements or restrictions need not authorize any public right of access or use. Exclusive use and possession of the area may remain with the applicant.

a. All feasible mitigation measures shall be incorporated into projects to minimize adverse environmental effects.

i. If the project involves dredging, mitigation measures must include the following:

(a). Dredging and spoils disposal must be planned and carried out to avoid significant disruption to wetland habitats and to water circulation;

(b). Limitations may be imposed on the timing of the operation, the type of operation, the quantity of dredged material removed, and the location of the spoil site;

(c). Dredge spoils suitable for beach replenishment shall, where feasible, be transported to appropriate beaches or into suitable longshore current systems;

(d). ***Other mitigation measures may include opening up areas to tidal action, removing dikes, improving tidal flushing, or other restoration measures.***

b. If the project involves diking or filling of a wetland, the following minimum mitigation measures shall apply. These mitigation measures shall not be required for temporary or short-term fill or diking if a bond or other evidence of financial responsibility is provided to assure that restoration will be accomplished in the shortest feasible time.

i. If an appropriate restoration site is available, the applicant shall submit a detailed restoration plan to the Director PDSD

which includes provisions for purchase and restoration of an equivalent area of equal or greater biological productivity and dedication of the land to a public agency or otherwise permanently restricting its use for open space purposes. The site shall be purchased before the dike or fill development may proceed.

ii. The applicant may, in some cases, be permitted to open equivalent areas to tidal action or provide other sources of surface water. This method of mitigation is appropriate if the applicant already owns filled, diked areas which themselves are not environmentally sensitive habitat areas but may become so, if such areas were opened to tidal action or provided with other sources of surface water.

iii. If no appropriate restoration sites under options (i) and (ii) are available, the applicant shall pay an in-lieu fee, determined by the County Board of Supervisors, which shall be of sufficient value to an appropriate public agency for the purchase and restoration of an area of equivalent productive value, or equivalent surface area.

c. The third option above shall be allowed only if the applicant is unable to find a willing seller of a potential restoration site. Since the public agency may also face difficulties in acquiring appropriate sites, the in-lieu fee shall reflect the additional costs of acquisition, including litigation and attorney's fees, as well as the cost of restoration, relocation and other costs. If the public agency's restoration project is not already approved by the Coastal Commission, the public agency may need to be a co-applicant for a coastal development permit to provide adequate assurance that conditions can be imposed to assure that the purchase of the mitigation site shall occur prior to the issuance of the permit. In addition, such restoration shall occur in the same general region (e.g., within the same stream, lake, or estuary where the fill occurred).

i. Any areas where vegetation is temporarily removed shall be replanted with a native species in a quantity and quality equal to the vegetation removed.

ii. Pedestrian trails, observation platforms and other incidental structures shall be designed to reduce disturbance of wildlife and vegetation; examples of improvements so designed would be elevated walkways and viewing platforms, and vegetative and structural barriers to decrease disturbances from permitted uses and inhibit internal access.

iii. Passive nature study uses shall include a program to control litter; examples include litter containers and "no littering" signs posted in the project area.

iv. Environmentally sensitive habitat areas shall be restored and enhanced to lessen the risk of flood damage to adjacent properties.

v. Any construction, alteration or other improvement shall generally be carried out between September 15 and April 15 to avoid disturbing rare, threatened, or endangered species which utilize the area for nesting. This requirement shall not apply if it can be demonstrated to the satisfaction of the Director PDSD that no such disturbance would occur, in which case construction shall be timed to cause the least disturbance to wetland dependent species; e.g., migratory waterfowl and shorebirds.

vi. Construction/maintenance activities shall be carried out in areas of minimal size. Preconstruction topography shall be restored subsequent to the conclusion of the project unless such topography is to be altered to conform with an approved restoration project.

2. The applicant shall demonstrate that the functional capacity is maintained or augmented through the criteria set out below unless relieved of any one or more of these requirements by the California Department of Fish and Game, and that the project does not significantly:

a. Alter existing plant and animal populations in a manner that would impair the long-term stability of the ecosystem; i.e., natural species diversity, abundance and composition are essentially unchanged as a result of the project;

b. Harm or destroy a species or habitat that is rare or endangered;

c. Harm a species or habitat that is essential to the natural biological function of a wetland or estuary;

d. Reduce consumptive (e.g., fishing, aquaculture and hunting) or nonconsumptive (e.g., water quality and research opportunity) values of a wetland or estuarian ecosystem.

3. If the proposed project involves restoration of a degraded wetland, the applicant shall comply with California Public Resources Code Sections 30411and 30233 to the satisfaction of the Director.

~~**1. Master Coastal Development Permit**~~

~~The Bolsa Chica Wetlands Restoration Program is the Master Coastal Development Permit for all Conservation Planning Areas within the Bolsa Chica Planned Community.~~

~~The Wetlands Restoration Program is a separate Implementing Actions Program for the Bolsa Chica LCP Land Use Plan, which is summarized in Subsection 1.3.3 of this Planned Community Program.~~

~~Any amendments proposed to the Wetlands Restoration Program shall be processed in the same manner as other Coastal Development Permits as set forth in Section 10.4, Procedures, of this Chapter. Any "minor refinements" to the Wetlands Restoration Program, as defined in the Wetlands Restoration Program, shall be processed by the Director of EMA, as set forth in the Wetlands Restoration Program.~~

~~**2. Project Coastal Development Permits**~~

~~Project Coastal Development Permits shall be prepared and processed for each Restoration Phasing Area (RPA) identified in the Wetlands Restoration Program.~~

~~The content of Project CDP applications for each RPA shall be as set forth in the Wetlands Restoration Program. Project CDP applications for RPA's may be combined, and shall be processed in the same manner as other Project CDP's, as set forth in Section 10.4, Procedures, of this Chapter.~~

10.2.4 Coastal Development Permits within *Open Space and* Recreation Planning Areas ~~2A and 2B (Bolsa Chica Regional Park)~~

~~In consideration of the fact that the Orange County Board of Supervisors has approved a General Development Plan/Resource Management Plan (GDP/RMP) for Bolsa Chica Regional Park, Master and Area-wide Coastal Development Permits for the regional park are not required by this Planned Community Program.~~

The County may incorporate the General Development Plan/Resource Management Plan (GDP/RMP) into the Bolsa Chica LCP if it is modified in accordance with the policies of Chapter 4 of the Land Use Plan and is certified by the Coastal Commission as an LCP amendment.

~~Project~~ Coastal Development Permits shall be prepared and processed for ***any development that has been*** ~~each implementation phase for Bolsa Chica Regional Park, as identified in the Bolsa Chica Regional Park GDP/RMP, or as otherwise may be~~ budgeted and approved by the Orange County Harbors, Beaches and Parks Commission.

The content of CDP applications for each phase of Regional Park implementation shall be as set forth in Subsection 10.3.3, Coastal Development Permits. Such CDP applications shall be processed in the same manner as other Project CDP's as set forth in Section 10.4, Procedures.

10.2.5 Coastal Development Permits within ~~Recreation,~~ Residential, and Public Facility Planning Areas ~~3A through 12~~

1. ~~Master~~ Coastal Development Permits

~~A Master~~ Coastal Development Permit, including all or portions of ~~Recreation~~, Public Facility, and Residential Planning Areas ~~3A through 12~~, shall be processed ~~in order to~~ ***for all development, including but not limited to development that would***:

a. Permit the construction of master utilities and backbone infrastructure improvements (e.g., arterial and collector roads, backbone flood control/drainage facilities, backbone water storage and distribution facilities, backbone sewer system, and similar public works and facilities required to serve land use development);

b. provide sufficient detail to permit mass grading of specific Planning Areas in anticipation of land use development;

c. provide sufficient detail to permit grading ~~of jurisdictional wetlands~~ for ~~development and/or~~ wetland~~s~~ restoration;

d. provide sufficient detail to refine, at construction level of detail, the development/wetlands/ecosystem area boundary, ~~and to permit grading and slope stabilization within this interface area~~;

e. provide sufficient detail to permit the dedications required for the ~~Wetlands Ecosystem Area~~, ~~Bolsa Chica~~ ***Harriett Wieder*** Regional Park, and other public parks, trails, and community facilities; and

f. provide sufficient detail to permit subdividing the Master CDP project area into large parcels for financing and/or the sale or lease to builders/developers, or dedications to the County of Orange and/or other public agencies.

~~As defined in the Bolsa Chica Land Use Plan, separate Master Coastal Development Permits may be prepared for major phases of development implementation, including Phases 1A, 1B, and 1C on the Bolsa Chica Mesa, and/or Phases 2A and 2B in the Northeast Lowland.~~

~~In recognition of the fact that the Planned Community Development Map and Statistical Table will require refinements as more accurate design, planning, and engineering information becomes available, a Master CDP and its amendments may serve as a tracking mechanism and historical record for revisions to Planning Area mapping and statistics as they are approved over time.~~

10.3 CONTENT OF APPLICATIONS

This Section applies to this Bolsa Chica Planned Community Program and references Section 7-9-118 of the County Zoning Code with exceptions as noted herein. All applications for Coastal Development Permits and Use Permits shall be filed with the Director, ~~EMA~~ ***PDSD*** pursuant to Orange County Zoning Code Section 7-9-150.2, "Applications".

~~10.3.1 Master Coastal Development Permits~~

1. Planning Area Development

a. Master Grading Plan, including:

i. existing and proposed grades;

ii. cut and fill quantities; ~~and~~

iii. stockpiling areas, if applicable;

iv. geotechnical report identifying any hazards and including necessary recommendations to mitigate hazards, identification of any conditions that may significantly affect the development potential of the area; and

v. erosion control and landscaping plan to prevent soil erosion after mass grading.

~~b. Wetlands-Development Interface Plan, if applicable, including:~~

~~i. detailed grading plans along the edge between development and the adjacent Wetlands Ecosystem Area;~~

~~ii. refined description of development, wetlands, and wetlands/ESHA Buffer boundaries;~~

~~iii. any proposed refinements to the Wetlands Restoration Program;~~

~~c. If applicable, any revisions to the Planned Community Development Map and Statistical Summary pursuant to Section 11.4, Procedures for Revisions to the PC Development Map and Statistical Summary. In the case of proposed refinements to Planning Areas that adjoin the Wetlands Ecosystem Area, include maps, calculations, and related documentation demonstrating no net loss of wetlands acres (Note: A copy of the Vesting "A" TTM may be included with the Master CDP for reference, but approval of the Master CDP shall not be construed as approval of the TTM, which is separately subject to the California Subdivision Map Act and County Subdivision Ordinance.).~~

b. Research design, data recovery and all other documentation to determine the extent of archaeological and paleontological resources of the LCP area in accordance with the requirements of the General Regulations of this PC Program.

e. LCP consistency statement.

2. Master Roadway *and Public* Improvements

a. General public street ***and trails*** layout and dimensions (arterials and collectors);

b. Conceptual roadway ***and trail*** phasing; and

c. LCP consistency statement.

4. Master Drainage/Flood Control Improvements

a. Flood control/drainage system description~~; and~~

b. A Water Quality Management Plan. A water quality management plan shall identify specific source control and treatment measures to be implemented. The water quality management plan shall also establish long-term operation and maintenance responsibilities.; and

c. LCP consistency statement.

~~**5. Master Oil Facilities Plan**~~

~~A Master Oil Facilities Plan, including the following and consistent with the approved Bolsa Chica Wetlands Restoration Program:~~

~~a. Map and text describing that overall relationship of ongoing oil wells and production facilities to Master CDP improvements, including any relocation or consolidation of wells, access/service roads, or other facilities that will be accomplished in conjunction with Master CDP improvements;~~

~~b. Control measures and standards related to oil well operator access and oil field operation affects on Master CDP improvements (e.g., how runoff water quality will be protected, when service vehicles will be permitted on-site, and any light/noise controls and standards applicable to field operations);~~

~~c. On-shore oil spill prevention measures (e.g, road berming, catch basins, and well cellar pump outs);~~

~~d. Oil field maintenance and monitoring program, including periodic inspection of oil facilities for potential leaks, timely removal of facilities and service roads no longer required, removal or remediation of any oil-impregnated soil, and procedures to ensure~~

~~that oil and related fluids to not enter development areas or the Wetlands Ecosystem Area.~~

~~e. Subsidence mitigation measures if required by the California Department of Oil and Gas.~~

~~**10.3.2 Area-Wide Coastal Development Permits**~~

10.3.2 ~~2~~. Large-Scale Development Plan

a. Location, acreage, and type of land use for each building site.

i. Number and location of dwelling units to be developed on each building site.

ii. Size and height of proposed structures.

iii. Minimum building site area for each development area.

iv. Development regulations utilized per Chapter 5 (i.e., single-family attached or multi-family).

v. General public street/corridor layout and width.

vi. Location and acreage of landscape, open space, and recreation areas.

vii. Park location and acreage, if applicable.

viii. Location, acreage, and land use of all non-residential areas.

ix. Topography: existing and proposed (i.e., Conceptual Grading Plan).

x. Existing structures and development on adjacent parcels, to a minimum of two hundred (200) feet from the Planning Area boundary.

xi. Conceptual Drainage Plan. ***Including a water quality management plan. A water quality management plan shall identify specific source control and treatment measures to be implemented. The water quality management plan shall also establish long-term operation and maintenance responsibilities.***

xii. Location of public pedestrian and biking trails.

xiii. Location of riding and hiking trails.

xiv. Location and treatment of significant cultural/scientific resources.

xv. Location ***and amount*** of significant vegetation and an indication of the resources to be altered and the resources to be preserved. ***For any resources that must be altered a mitigation plan for replacement shall also be submitted.***

xvi. Location and treatment of scenic highways, if applicable.

xvii. Location of extensions of off-site roads or utilities through a Planning Area to serve adjacent areas.

xviii. Geotechnical report analyzing any hazardous conditions of the project area, supporting any proposed grading and containing any recommendations for site development.

~~**5. Neighborhood Commercial Development (if applicable)**~~

~~The Area-wide CDP that includes Planning Area 6 shall comply with the "Guidelines: Neighborhood Commercial" of the Orange County General Plan if commercial development is proposed. If no commercial development is proposed, a marketing study shall be included which demonstrates the infeasibility of commercial development in Planning Area 6.~~

~~**6. Trail Between Northeast Lowland and Regional Park (if applicable)**~~

~~The Area-wide CDP that includes Planning Area 11 shall contain requirements for the implementation of the Class I Trail connecting the Lowland residential development and Bolsa Chica Regional Park.~~ ***Any trails within the Lowland shall be compatible with the enhancement, restoration and preservation of the wetlands and shall not involve the fill of existing wetlands.***

~~**9. Update of Master Oil Facilities Plan (if applicable)**~~

If a Planning Area included in an Area-wide CDP contains continuing oil facilities, the Master Oil Facilities Plan, prepared for the Master CDP, shall be confirmed or updated, as appropriate.

~~10.3.3 Project Coastal Development Permits~~

10.3.3 All Coastal Development Permits

1. **Site Plan** - drawn to scale, fully dimensioned, and easily readable, containing the following:

l. Parking areas***, clearly delineating the number and size of all parking spaces***.

q. Topography, existing and proposed (i.e., Conceptual Grading Plan ***along with site specific geologic and soils engineering reports, reviewed and approved by Director, PDSD.***

w. Location ***and amount*** of significant vegetation and an indication of the resources to be altered and the resources to be preserved. ***For any resources that must be altered a mitigation plan for replacement shall also be submitted.***

aa. A Water Quality Management Plan. A water quality management plan shall identify specific source control and treatment measures to be implemented. The water quality management plan shall also establish long-term operation and maintenance responsibilities.

bb. Any additional background and supporting information the Director, ~~EMA~~ ***PDSD***, deems necessary.

9. **Sign Program per Section 8.2.3 (optional).**

Except that a Sign Program is required for the Conservation, Open Space and Recreation Planning Areas pursuant to Chapter 4 of the LUP.

~~**10.3.4 Alternative Development Standards**~~

~~With approval of a Coastal Development Permit, Alternative Development Standards may be established without an LCP amendment where the standards pertain to: setbacks to residential streets; nonresidential highways and local residential street widths; rear and side yard setbacks for development not bordering Conservation or Recreation Planning Area; building heights; area per unit for residential; walls and fences; landscaping; signage; lighting; loading, trash, and storage areas; vehicular driveways and sidewalks; outdoor storage areas; and/or modifications for off-street parking~~

~~requirements. Alternative Development Standards other than those specified above will require an LCP amendment.~~

10.4 PROCEDURES

10.4.1 Coastal Development Permits shall be processed in compliance with the CD "Coastal Development" District Regulations, Section 7-9-118, of the County Zoning Code~~, and the provisions of this Chapter~~.

~~10.4.2 Area-wide CDP's and Use Permits shall be processed per Orange County Zoning Code Section 7-9-150.3(c), "Public Hearing."~~

~~10.4.3 If Alternative Development Standards are proposed as part of a proposed Area-wide CDP and/or Project CDP, or if said permit would authorize a principal use not specifically identified as permitted by this Planned Community Program, such Coastal Development Permit shall always require a public hearing per Orange County Zoning Code Section 7-9-150.3(c).~~

~~10.4.4 Coastal Development Permits shall be approved as precise plans for the location of the uses and structures. If minor amendments or changes are proposed regarding the location or alteration of any use or structure, a Changed Plan shall be submitted for approval to the Director, EMA pursuant to Orange County Zoning Code, Section 7-9-150.3.~~

~~10.4.5 Applications for Master CDPs, Area-wide CDP's, Project CDP's may be processed concurrently with a Tentative Tract Map(s), with one environmental review. At the discretion of the Director, EMA, minor projects which are accessory to, or an expansion of, an existing approved use may be exempted from the requirement for a Coastal Development Permit.~~

~~10.4.6 When a Coastal Development Permit Application proposes to establish Alternative Development Standards, the Application shall provide, through the submittal of graphics and/or text, a description of the proposed Alternative Development Standards and how they differ from the baseline standards. In addition, the following criteria shall be considered prior to final action on the Coastal Development Permit.~~

~~**1. General Character:** Harmony in scale, bulk, coverage and density with surrounding land uses.~~

~~**2. Facilities:** The availability of infrastructure facilities to serve the project.~~

~~**3. Harmful Effects:** The harmful effects, if any, upon desirable neighborhood environments.~~

~~**4. Traffic:** The generation of traffic and its effect on the capacity and character of surrounding streets.~~

~~**5. Noise:** The existing and predictable future level and quality of noise the property is subject to, and the noise which would be generated by the proposed use.~~

~~**6. Suitability:** The physical suitability of the site for the proposed project.~~

~~10.4.8 The appropriate County agencies shall ensure that the actual development is consistent with the approved Coastal Development Permit. Minor deviations from an approved Coastal Development Permit as determined by the Director, EMA, may be permitted as a Changed Plan without an amendment to the Coastal Development Permit.~~

~~10.4.9 Deviations from an approved Coastal Development Permit which increase the number of dwelling units and/or changes the type f dwelling unit in a Residential Planning Area shall require approval by the Planning Commission per Section 7-9-150.3(c).~~

11. DEVELOPMENT MAP AND STATISTICAL TABLE REGULATIONS AND PROCEDURES

11.1 PURPOSE AND INTENT

11.1.1 **Adoption** -- A Planned Community Program is initially processed and adopted per Section 7-9-155, except that the Planned Community Development Map and Statistical Table are adopted by resolution of the Board of Supervisors while the Planned Community Text, Zoning Map, and Statistical Summary are adopted by County ordinance.

11.1.2 **Amendment** -- After the Planned Community Development Map and Statistical Table have been adopted by the Board of Supervisors, it may be amended per Orange County Zoning Code Section 7-9-150.3 (c), "Planning Commission". However, if an amendment would change a policy approved by the Board of Supervisors, a recommendation shall be made to forward the proposed amendment to the Board for final action. ***No change to the Planned Community Development Map or Statistical Table shall become effective until certified by the Commission as an LCP amendment.***

~~11.4 PROCEDURES FOR REVISIONS TO THE PLANNED COMMUNITY DEVELOPMENT MAP AND STATISTICAL TABLE~~

~~Revisions to the Planned Community Development Map and Statistical Table are permitted in accordance with the following procedures:~~

~~11.4.1 All revisions to the Planned Community Development Map and Statistical Table shall be consistent with the Planned Community Zoning Map and Statistical Summary. Revisions shall be consistent if they meet the requirements of this Chapter.~~

~~11.4.2 All Planning Area boundary lines and acreages identified on the Planned Community Development Map and Statistical Table are estimates based upon current information and a generalized level of mapping. Refinements to the Planning Area boundaries/acreages are expected to occur with future project design and more detailed mapping and engineering. For this reason, Planning Area boundary lines and acreages shown on the Planned Community Development Map and Statistical Table may be refined without amending the body of this Planned Community text, when more accurate information becomes available and is submitted with future Permit Applications and/or Tentative Tract Maps.~~

~~11.4.3 Any proposed revision to increase estimated dwelling units in one or more Planning Area(s) shall be offset by a corresponding decrease in another Planning Area(s), so that the maximum number of dwelling units shown on the Planned Community Statistical Table does not exceed either the maximum dwelling units for the entire Planned Community, or the maximum dwelling units shown on the Statistical Table for each respective Planning Area.~~

~~11.4.4 Any proposed revision to reallocate the estimated number of dwelling units and/or the estimated gross acres assigned from one Planning Area to another Planning Area by more than ten (10) percent shall require a public hearing per Orange County Zoning Code Section 7-9-150.3. Revisions of ten (10) percent or less shall be deemed administrative refinements, and may be approved by the Director, EMA. Any change to the maximum dwelling units allowed in any Planning Area shall require a public hearing.~~

~~11.4.5 Any proposed revision to the Planned Community Development Map and Statistical Table shall be accompanied by a Coastal Development Permit application and/or Tentative Subdivision Map application.~~

~~11.4.6 Any proposal to reallocate the estimated number of dwelling units, and/or the estimated gross acreage assigned to land uses from one Planning Area to another Planning Area shall require submittal of the following information:~~

~~1. The proposed graphic revision to the Planned Community Development Map reflecting the proposed changes to the Planned Community Statistical Table;~~

~~2. An analysis of the proposed changes with the Planned Community Zoning Map and Statistical Summary;~~

~~3. A summary of: a) the number of units previously approved on all Tentative and all recorded Final Subdivision Maps; and b) the number of units under construction or constructed at the time of the proposed Planned Community Statistical Table revision;~~

~~4. Identification of the ownership of the Planning Areas to be affected by the proposed Planned Community Statistical Table revision; and~~

~~5. Any additional background and/or supporting information which the Director, EMA, deems necessary.~~

~~11.4.7 Unless determined otherwise, the Planned Community Program document shall serve as the location for any future revisions to the Bolsa Chica Planned Community Development Map and Statistical Table, as they may be approved from time to time.~~

12.0 DEFINITIONS

2. **Bolsa Chica Local Coastal Program (LCP)** - The planning document prepared by the County of Orange to comprehensively satisfy the requirements of the California Coastal Act for the Bolsa Chica segment of the County's North Coast Planning Unit, and consisting of the Land Use Plan (LCP Part I)~~,~~ ***and*** Planned Community Program (LCP Part II)~~, and Wetlands Restoration Program (LCP Part III)~~.

5. **Bolsa Chica Regional Park** -The planned 106-acre Orange County regional park along the Huntington Mesa to link Huntington Central Park and Bolsa Chica State Beach. (Historically known as Bolsa Chica Linear Park ***and now known as Harriett Wieder Regional Park***.)

7. **Buffer** -Open space that ~~vertically and/or~~ horizontally separates and protects habitat areas from development areas. ***Buffer areas are not in themselves a***

part of the environmentally sensitive habitat area to be protected. Buffers may contain limited trail usage ***and other non-substantial structures such as interpretive signage*** but generally serve to reduce the impact of human activities on wildlife.

10. **California Department of Fish & Game (CDFG)** -The State agency having authority and responsibility to protect and enhance fish and wildlife resources and to administer State Ecological Reserve lands. ***Under Section 30237 of the Coastal Act, it was specifically given lead agency authority for wetlands identification purposes with respect to the preparation of the Habitat Conservation Plan for the Bolsa Chica Wetlands.***

11. **Certification** -The California Coastal Commission procedure to review Local Coastal Programs (i.e., Land Use Plans and Implementing Actions Programs) to determine if ~~they raise a substantial issue as to conformity with the policies set forth in the Coastal Act. If no substantial issues are raised, the Local Coastal Program is deemed certified~~. ***(1) a Land Use Plan or a Land Use Plan Amendment meets the requirements of and conforms with the Chapter 3 policies of the California Coastal Act; and (2) an Implementation Program which conforms with and is adequate to carry out the provisions of the certified Land Use Plan.***

13. **Coastal Conservancy** –The State agency established under California Public Resources Code §31000-31405, having consultation and land stewarding responsibilities. It was specifically given lead agency authority under §30237 of the Coastal Act to ~~resolve differences~~ ***identify land use alternatives*** regarding Bolsa Chica through preparation of the Habitat Conservation Plan.

14. **Coastal Development Permit** -A permit issued by the County of Orange***,*** or the Coastal Commission ***(on appeal),*** which is an approval of a ~~use~~ ***proposed development within the coastal zone of Orange County and*** subject to the provisions of Section 7-9-118 of the Orange County Zoning Code and the Coastal Act. ***In areas of the Coastal Commission's original jurisdiction only the Coastal Commission can approve a coastal development permit.***

17. **community facility** -A for-profit commercial or nonprofit use established ~~primarily~~ to service the immediate population of the community in which it is located ***as well as the general public***.

21. **Edwards Thumb** - ~~A geographical area consisting of about 32~~ ***Planning Area 1D containing approximately 51*** acres in the northeast corner of the Lowland, bordered by residential development in the City of Huntington Beach, the Huntington Mesa bluffs, and Edwards Street.

36. **Landowner/Master Developer** - ~~Koll Real Estate Group~~ ***Hearthside Homes***, the major property owner ~~in~~ ***on*** the Bolsa Chica ~~Lowland~~ ***Mesa***. Other significant property owners ***on the Bolsa Chica Mesa*** include ~~the State Lands Commission, the Metropolitan Water District, and the Fieldstone Corporation~~ ***the Ocean View School District, and D.E. Goodell***.

~~40. **Master Oil Facilities Plan** - A component of the Master Coastal Development Permit as required by the Bolsa Chica Planned Community Program.~~

~~42. **Northeast Lowland** - Those lands in the Lowland located within Planning Areas 3D, 4C, 10, and 11, approximately 1,000 feet seaward of the existing homes in the City of Huntington Beach.~~

45. **Orange County** ~~**Environmental Management Agency (EMA and OCEMA) -**~~ ***Planning and Development Services Division (PDSD)*** The Orange County agency that encompasses planning; building; flood control; harbors, beaches, and parks; and other departmental functions. The ~~Environmental Management Agency~~ ***Planning and Development Services Division*** is responsible for preparation of the Bolsa Chica Local Coastal Program.

56. **visitor-serving facilities** -Facilities that fulfill the Coastal Act purpose of providing public access***, public*** ~~and~~ recreation***, including commercial facilities which cater primarily to visitors (such as restaurants, cafes, retail specialty stores, or retail businesses orientated to the needs of park and wetland area visitors)*** within the Coastal Zone.

57. **Wetlands Ecosystem Area** - ~~The collective area of wetlands, ESHAs, and Buffer areas which are the subject of the Wetlands Restoration Program, totaling, within the Bolsa Chica Planned Community, approximately 1,098 acres~~. ***The Wetlands Ecosystem Area is comprised of all of Planning Areas 1A, 1B, and 1D (which includes the Edwards Thumb area) as shown in County Figure 2.1-1***.

~~58. **Wetlands Restoration Program** - An Implementing Actions Program of the Bolsa Chica LCP Land Use Plan, to consolidate, preserve, create, and restore wetlands, ESHAs, Buffers and non-tidal open space areas.~~

B. WETLANDS RESTORATION PROGRAM

The "*Wetlands Restoration Program*" is deleted in its entirety from the "*Implementing Actions Program*".

C. BOLSA CHICA DEVELOPMENT AGREEMENT

The "*Bolsa Chica Development Agreement*" is deleted in its entirety from the "*Implementing Actions Program*".

VIII. FINDINGS FOR DENIAL OF THE COUNTY OF ORANGE'S LAND USE PLAN AMENDMENT 1-95, AND APPROVAL WITH MODIFICATIONS

The Commission hereby finds and declares as follows. By reference the Commission hereby also adopts as findings the Background Section (Chapter IV) of this staff report. The following pages contain the specific findings for denial of the County of Orange's Bolsa Chica Land Use Plan Amendment 1-95, as submitted, and approval with modifications.

Note: Policy numbers in the suggested modifications of this staff report for the LCP, as submitted are shown with parentheses at the end of each policy. For example: "*(3.2.2.20)".* Policy numbers are "*built*" by taking the chapter number and adding the policy number. For example the public access and visitor serving chapter number is "*4.2*". The first policy in this chapter will have the number "*4.2.1*". The deletion and addition of policies through these suggested modifications will affect the overall numbering of policies. A policy based on the revised number scheme will have the word "*new*" in parentheses after the policy number. For example "*4.2.5 (new)*". Unless a policy number is referenced as "*new*" assume that it refers to an LCP policy number "*as submitted*".

A. RESOURCE RESTORATION AND CONSERVATION COMPONENTS
CHAPTER 3 OF THE LAND USE PLAN AMENDMENT

1. WETLANDS/BIOLOGICAL RESOURCE POLICIES

a. DENIAL OF THE LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan

The 1986 Land Use Plan (the "1986 LUP") allowed the construction of a marina in conjunction with restoration of degraded wetlands. The Plan provided for the establishment of 915 acres of fully functioning wetlands, 86 acres of environmentally sensitive habitat areas, and protective buffers between development and wetlands. Tidal influence for the wetlands was to be provided either through a navigable ocean entrance near the intersection of Warner Avenue and Pacific Coast Highway or a non-navigable ocean entrance. If the non-navigable ocean entrance was constructed, ocean access for boats was to be through Huntington Harbour. The 1986 LUP provided that the marina could include associated visitor serving commercial facilities and ancillary residential units. The 1986 LUP allowed for ongoing oil production to continue if managed in a manner consistent with protection of biological resources. The phasing of wetland restoration would also have been influenced by the phase-out of existing oil production facilities in the Lowland.

The 1986 LUP provided that wetlands restoration would be funded by the marina developers. The restoration program was to be developed in cooperation with the California Department of Fish and Game. Specific wetland restoration criteria included: 1) No habitat of endangered species could be disturbed until an equivalent area of high quality, fully functioning habitat had been established and its maintenance assured; 2) the area of high functioning pickleweed saltmarsh could not be less than 200 acres at any time; 3) lowland development could not be initiated until the wetland restoration program was approved by all parties; 4) the area of functioning wetland could not fall below 852 acres, which was the number of wetlands acres that were degraded but viably functioning. Prior to any development within the 852 acres, new wetlands had to be created and fully functioning (for each impacted acre, 1.5 new acres would be created); and 5) Prior to any land division or issuance of any grading permits or building permit on the Bolsa Chica Mesa, the landowner was required to either dedicate the lowland area or provide financial security in an amount sufficient to assure acquisition when restoration was initiated.

(2). Land Use Plan Amendment

The Bolsa Chica LCP was submitted for Commission review in June 1995. The Commission subsequently acted on the Bolsa Chica LCP on January 11, 1996. This decision became the subject of a lawsuit. The Trial Court remanded the Bolsa Chica LCP back to the Commission. The Commission again took action on the Bolsa Chica LCP on October 9, 1997. This decision was appealed and the Appellate Court has remanded the Bolsa Chica back to the Commission. To comply with the Appellate Court's remand, the Commission is once again hearing the Bolsa Chica LCP. Though the plan as originally submitted has been informally suggested for revision by the developer, the narrative describing the Bolsa Chica LCP will be based on the County's original June 1995 submission.

The 1995 amended Land Use Plan, as originally submitted in June 1995, provided for the establishment of an approximately 1,100 acre wetland ecosystem that would have included approximately 998 acres of fully functioning wetlands, 65 acres of environmentally sensitive habitat area, and 37 acres of buffer. Tidal influence for the wetland ecosystem was to be provided by construction of a non-navigable ocean entrance near the south end of the Bolsa Chica Lowland.

The wetlands restoration plan as submitted proposed that the area of fully functioning wetlands would not be less than 852 acres at any time and that fully functioning environmentally sensitive habitat would not be less than 65 acres at any time. When proposed development would adversely impact an environmentally sensitive habitat area, replacement habitat was planned. The Rabbit Island ESHA would not be adversely impacted by the proposed development.

As submitted, the developer proposed to dedicate approximately 770 to 794 Lowland acres upon receipt of a Section 404 Permit from the Army Corps of Engineers; or, if the landowner voluntarily decided not to proceed with Lowland development (i.e. the landowner failed to pursue a Section 404 Permit and Coastal Development Permit). Should the developer have the Section 404 Permit denied, Lowland dedication would not occur; however, Mesa development would still be allowed. Financing the wetland restoration of the Lowlands was proposed to be funded through Lowland residential development.

As submitted, the wetland restoration program was to have been phased and would have consisted of six phases. Restoration Phases 1 and 2 were to be initiated one year prior to initiating construction of residential development in the Lowland. Phases 1 and 2 proposed to restore approximately 413 acres. Phase 3 through Phase 6 of the restoration effort would have been linked to the natural depletion of oil reserves. Phases 3 through 6 proposed to restore approximately 529 acres.

(3). Applicable Coastal Act Policies

Applicable Coastal Act policies for analyzing the conformance of the amended Land Use Plan concerning biological resources are Sections 30230, 30231, 30233, 30240, and 30411. These policies pertain to the protection of coastal marine and wetland resources. Section 30230 requires that marine resources shall be maintained, enhanced, and were feasible, restored. Section 30231 requires that the biological productivity and the quality of wetlands shall be maintained and where feasible, restored. Section 30233 restricts development in wetlands to eight limited uses. Section 30240 requires the preservation of environmentally sensitive habitat. Moreover, Section 30240 requires that development when it is adjacent to environmentally sensitive habitat areas be sited and designed to prevent impacts which would significantly degrade those areas and requires that proposed development be compatible with maintaining habitat values. Section 30411 establishes the Department of Fish and Game and the Fish and Game Commission as the principal agencies responsible for the management of wildlife. Furthermore it authorizes the Department of Fish and Game to study degraded wetlands and to identify those degraded wetlands that can be feasibly restored in conjunction with a boating facility.

(4). Coastal Act Consistency

(a). Inadequate Development Setback on the Bolsa Chica Mesa

Sections 30230, 30231, 30233 and 30240 mandate that biological productivity of wetlands and associate upland areas be maintained and where feasible enhanced. Urban development within and adjacent to ecologically sensitive areas impairs their

biological productivity. In this case, the Bolsa Chica LCP as submitted would have authorized the construction of 2,400 residential units on the Bolsa Chica Mesa.

The Bolsa Chica Mesa is considered ecologically valuable. According to both the California Department of Fish and Game and the U.S. Wildlife Service the Bolsa Chica Mesa and the lowland wetlands are biologically interdependent. These biological interdependencies are vital to maintaining biological productivity and diversity. Residential development on the Mesa will impair biological productivity of the Mesa itself and the adjacent lowland wetlands. Adverse impacts from residential development include: disturbances to wildlife from human activity, disruptive noise and lights, introduction of pollutants, loss of terrestrial habitat, loss of nesting and foraging habitat, loss of wildlife movement corridors, introduction of non-native plants that reduce habitat value, and adverse impacts to native plants and animals from domestic pets.

To minimize adverse impacts from urban development the Commission routinely imposes buffers. Buffers and development setbacks protect biological productivity by providing the horizontal spatial separation necessary to preserve habitat values and transitional terrestrial habitat area. Furthermore, buffers may sometimes allow limited human use such as passive recreation, and minor development such as trails and fences when it will not significantly affect resource values. Buffer areas are not in themselves a part of the environmentally sensitive habitat area to be protected. Spatial separation minimizes the adverse effects of human use and urban development on wildlife habitat value through physical partitioning. The greater the spatial separation, the greater the protection afforded the biological values that are at risk. Buffers may also provide ecological functions essential for species in the ESHA.

As submitted, the amended Land Use Plan purports to provide a horizontal 100 foot buffer between the wetlands and the Mesa development. However, the 100 foot buffer designated in the LCP, as submitted, in some areas includes wetlands. The area designated as buffer in the LCP is measured through two different techniques. For the portion of the Mesa facing outer Bolsa Bay the buffer is calculated from the shared property line between Hearthside Homes and the Department of Fish and Game for a distance of 100 feet towards Outer Bolsa Bay[12] on CDFG property. For the portion of the Mesa facing the Bolsa Chica Lowlands, the buffer is measured from the Mesa's 5 foot MSL line towards the Lowland for a distance of 100 feet[13]. Neither, of these methods for computing the appropriate buffer is consistent with the requirement that the buffer begin at the edge of the sensitive habitat to be protected.

Besides the inappropriate inclusion of sensitive resources as part of the buffer, the proposed buffers appear inadequate in terms of providing appropriate spatial separation of the proposed development from the ESHA resources to be protected for two reasons.

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[12] Figure 4.5 of the Wetlands Restoration Program. Not included as an exhibit.

[13] Figure 4.6 of the Wetlands Restoration Program. Not included as an exhibit.

First, both the California Department of Fish and Game[14] and the U.S. Fish and Wildlife Service[15] previously recommended the imposition of a 100 Meter buffer. Second, Dr. Findlay[16] (Exhibit 15), from the University of Ottawa, states that his research suggests that development up to one kilometer or more from wetland areas can have noticeable and significant impacts on biodiversity. According to Dr. Findlay's letter the Ontario Wetlands Policy calls for a minimum setback of 120 Meters from Class-III (Provincially Significant) wetlands. Dr. Findlay, concludes his letter by recommending a minimum 150 Meter buffer at Bolsa Chica. Allowing an inadequate physical separation between the ESHA to be protected and the proposed residential development would allow the proposed development to adversely impact the ESHAs.

As submitted, the amended Land Use Plan proposed to relocate the existing Eucalyptus grove ESHA from the Bolsa Chica Mesa to the Huntington Mesa. Consequently, the Bolsa Chica LUP did not contemplate a buffer on the Bolsa Chica Mesa for the Eucalyptus grove ESHA. The proposed relocation of the Eucalyptus grove was consistent with prior Commission actions starting with the original 1985 Land Use Plan and the Commission's most recent decision of October 9, 1997. The Commission's decision, however, was challenged in court. The trial court agreed with the Commission's decision and found that the relocation of the Eucalyptus Grove was supported by the evidence. The decision by the Trial Court was appealed.

The Court of Appeal (Fourth Appellate District, Division One, State of California) found in April 1999 that the "*trial court erred with respect to relocation of the bird habitat. The Coastal Act does not permit destruction of an environmentally sensitive habitat area (ESHA) simply because the destruction is mitigated offsite*." The Court also found that for an ESHA to be impacted by development that there must be "*some showing*" that the destruction of an ESHA is needed to serve some other environmental or economic interest recognized by the Coastal Act. Based on the Court of Appeals decision, concerning the application of Section 30240 of the Coastal Act, the Eucalyptus grove ESHA must be protected in place. Consequently, an appropriate buffer for the Eucalyptus grove must be provided. Consistent with Section 30240 of the Coastal Act this will require that the proposed development be relocated to provide adequate separation from the ESHA such that it does not adversely impact the functioning of the Eucalyptus grove.

Based on the reasons stated above, the amended Land Use Plan (as submitted) does not contain an adequate buffer and the proposed development must be reconfigured to provide an adequate setback from ESHA areas. Therefore, for the reasons cited above the Commission finds that Section 3.1.2 of the amended Land Use Plan is inadequate, as

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[14] Environmentally Sensitive Habitat Areas at Bolsa Chica, June 3, 1982

[15] U.S. Fish and Wildlife Service Special Report; Bolsa Chica Area, May 1979

[16] Letter to the Commission which was received on February 9, 2000.

submitted, to implement the Chapter 3 policies of the Coastal Act regarding the provision for the maintenance of habitat values through the use of adequate buffers.

(b). Environmentally Sensitive Habitat Values Compromised

The Bolsa Chica Mesa is an approximately 244[17] acre undeveloped area. Though the predominate vegetative type on the Mesa top is non-native grassland various portions of the Mesa contain environmentally sensitive habitat areas (ESHA) (**Figure 1** on Page 5). These ESHA areas include a Eucalyptus tree grove and Warner Pond. Other habitat areas which have not been previously identified as ESHA because they are not a predominate vegetate type but are considered sensitive include Coastal Bluff Scrub habitat on the southwest bluff slope of the Bolsa Chica Mesa and two colonies of Southern Tarplant. The Southern Tarplant is a California Native Plant Society "*1B species*" which qualifies it as a rare, threatened or endangered plant.

The Mesa's non-ESHA and ESHA areas are consequently interdependent and constitute an ecological system. The Department of Fish and Game recognized this relationship in its June 1982 report, "*Environmentally Sensitive Habitat Areas at Bolsa Chica"* when it stated that: "*Habitat diversity is further enhanced by associations of eucalyptus-grasslands, eucalyptus-coastal sage scrub and eucalyptus (snags)-wetland communities."* Finally, the Mesa is an integrally associated habitat for the adjacent lowland wetlands. The Mesa provides habitat values for wetland dependent species in the form of pollinators for wetland plants and nesting and denning sites for avian and mammalian predators.

The Eucalyptus grove located on the Bolsa Chica Mesa is considered an ESHA since it provides habitat and nesting sites for a variety of raptors, particularly red-tailed hawks and white-tailed kites. The amended Bolsa Chica Land Use Plan (as submitted) would allow the habitat values of the existing Eucalyptus grove ESHA on the Bolsa Chica Mesa to be relocated through establishment of a native tree habitat on the Huntington Mesa. This proposed habitat relocation to Huntington Mesa was also part of the original 1986 Land Use Plan and the Commissions January 1996 and October 1997 decisions.

Sections 30240 mandates that environmentally sensitive habitat be protected against any significant disruption of habitat values. Section 30240 also establishes that development adjacent to environmentally sensitive habitat areas must be sited and designed to prevent impacts which would significantly degrade habitat values. The requirement that development must be sited and designed to avoid adverse impacts to the environment was significantly reinforced when the California Court of Appeals found in April 1999 that the Coastal Act does not allow the destruction of an ESHA even if replacement habitat is to be provided through offsite mitigation.

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[17] Revised Figure B-2 of the Bolsa Chica LCP, dated November 17, 1999.

The Eucalyptus grove is considered an ESHA because it provides habitat and nest sites for a variety of raptors. The Department of Fish and Game in their report of "*Environmentally Sensitive Habitat Areas at Bolsa Chica*" (1982) notes the presence of eleven raptor species. Species using the grove include the white tailed kite, marsh hawk, sharp-shinned hawk, Cooper's hawk, and osprey. Many of these raptors are dependent on the wetlands and upland areas to obtain their food. Bloom (1982) considered the Eucalyptus grove significant because it provided the only nesting habitat for tree nesting raptors in the vicinity of the wetlands. In 1985 the California Department of Fish and Game designated the Eucalyptus grove as an ESHA based on its value for nesting and roosting for a variety of raptors.

Though the Eucalyptus grove is considered an ESHA, for the ESHA to function effectively, adjacent areas which provide habitat values for the ESHA must also be preserved. The upland areas on the mesa are important because (1) many of the species which are dependent on the Eucalyptus trees and the Mesa pocket wetlands forage over the entire Mesa, (2) habitat areas need to be large enough to avoid habitat fragmentation and to provide connectivity to other habitat areas, and (3) habitat areas must be large enough to promote and maintain habitat and species diversity. To assure that the ESHA ecosystems function effectively, both the Department of Fish and Game and the U.S. Fish and Wildlife Service previously recommended the establishment of a 100 meter buffer on the Bolsa Chica Mesa in the 1980's. Dr. Findlay, of the University of Ottawa recommends the establishment of a 150 Meter buffer. Dr. Findlay states[18] that his research suggests "*that development of adjacent lands up to 1 km or more from a wetland can have noticeable and significant impacts on wetland biodiversity by (1) reducing quality and quantity of surrounding habitats which are, at least in Ontario, required by many wetland species during different parts of their life-cycle, particularly amphibians, birds, and reptiles; (2) increasing the likelihood of wetland invasion by non-endemic plants, invertebrates, birds and mammals; (3) modifying surface and sub-surface/groundwater flows, both in terms of quality and quantity. Our work further suggests that in many cases, the impacts of development of adjacent lands is not seen immediately; rather, it may take decades before the full impacts are revealed (Findlay et al. 2000)."*

County Policy 3.1.2.5 of the amended Land Use Plan (as submitted) proposes the relocation of the Eucalyptus grove ESHA functions to Huntington Mesa by establishment of a 20 acre native tree and shrub ESHA on the Huntington Mesa. In its certification of the 1986 Land Use Plan, the Commission found that relocation of the habitat values of the Eucalyptus grove to the Huntington Mesa was consistent with Section 30240. The amended 1995 Land Use Plan does not change the original plan to relocate the habitat values of the Eucalyptus grove. Though consistent with the Commission's prior decision on the 1986 Land Use Plan, County Policy 3.1.2.5, as submitted, is now considered

[18] Dr. Findlay letter to the Commission with the receipt date of February 9, 2000.

incompatible with Section 30240 of the Coastal Act as interpreted by a California Court of Appeal since elimination of the ESHA for residential development, even if mitigated, is inconsistent with the recent *Bolsa Chica* appellate court decision that the Eucalyptus grove be protected in place. In addition, even if the ESHA could be relocated, County Policy 3.1.2.5 is inconsistent with Section 30240 since it fails to specify when the twenty acre native tree and ESHA habitat is to be recreated. County Policy 3.1.2.5, as submitted, would allow the Eucalyptus ESHA to be destroyed before the replacement habitat was available as mitigation, thus a significant disruption of habitat value would occur. Therefore, the Commission finds that, as submitted, County Policy 3.1.2.5 of the amended Land Use Plan is inadequate to implement Section 30240 of the Coastal Act regarding the preservation of habitat value.

(c). Proposed Residential Development in the Lowlands is Not an Allowable Use

The Bolsa Chica Land Use Plan Amendment as submitted by the County of Orange originally allowed for the construction of 900 residential units in a 185 acre lowland area containing approximately 120 acres of wetland interspersed with 65 acres of upland. Section 30233 of the Coastal Act prohibits the fill of wetlands except for eight limited uses shown in Figure 16 on the page 239. One of the uses is for a boating facility in a degraded wetland if a substantial portion of the degraded wetland is restored. When the Commission certified the Bolsa Chica Land Use Plan in 1986, the plan allowed for the fill of wetlands in the Lowland for purposes of a marina. The 1986 Land Use Plan also allowed for various ancillary development supportive of the marina, including visitor-serving commercial development with overnight accommodations, and residential development.

The amended Land Use Plan, as submitted, completely eliminates the marina and associated visitor serving commercial development. The amended Land Use Plan, as currently proposed, is a residential only development.

SECTION 30233 AND 30411 ANALYSIS

Residential development is not identified as an allowable use within wetlands under Section 30233 of the Coastal Act. The County of Orange, however, asserted at the time of submission in 1995 that the residential development was an allowable use. The uses that are allowed in a wetland under Coastal Act section 30233 are shown in Figure 16 on page 239.

In 1981 the Department of Fish and Game determined that the Bolsa Chica Lowlands were a degraded wetland system in need of restoration. Section 30233(a)(3) establishes that a boating facility is allowed in a wetland that has been identified by the

Department of Fish and Game as degraded, if a substantial portion of the degraded wetland is restored and maintained as a biologically productive wetland. Coastal Act section 30411(b) authorizes the Department of Fish and Game to study degraded wetlands and identify those that can be feasibly restored in conjunction with a boating facility. Orange County maintained at the time of submission that Section 30411(b) allowed the construction of development other than a boating facility if the other development was a more a feasible and less environmentally damaging means to restore a degraded wetland. The text of Section 30411(b) is shown in Figure 17. Orange County concluded that a boating facility at Bolsa Chica would be economically and technically infeasible, that a boating facility would have a greater adverse environmental impact than residential development, and that the residential development would result in a greater amount of restored wetlands acreage than a boating facility. Based on this analysis, the County of Orange asserted that the proposed residential development was an allowable use.

The County of Orange analysis for concluding that residential development would be an allowable use is not a valid interpretation of the relationship between Section 30233(a)(3) and Section 30411(b) of the Coastal Act. First, the California Department of Fish and Game has not conducted the required study which addresses all three issues identified under Section 30411(b). This issue is described below in greater detail. Therefore, the County of Orange can not assert that the proposed residential use would be consistent with Section 30411(b).

Second, the wording of Sections 30233(a)(3) and 30411(b) when evaluated together do not allow residential development to be considered an allowable use of a wetland. Section 30233(a)(3) states that in a degraded wetland identified by the Department of Fish and Game, a **boating facility** may be constructed if a substantial portion of the degraded wetland is restored and maintained. Section 30233(a)(3) does not state that any other uses, such as residential development, can be constructed in a degraded wetland. Section 30411(b) begins by stating that *" in conjunction with development of a **boating facility** as provided in subdivision (a) of Section 30233"* (emphasis added). Uses other than a boating facility are again not referred to in this cross reference nor are they contemplated. The next sentence of Section 30411(b) references a required study that must be conducted and states: "*Any such **study** shall include consideration of all of the following:"* (emphasis added). Items 1 through 3 then specify what the study must contain. Items 1 through 3 do not specify that a use other than a boating facility is permissible under either Section 30233 or 30411. Item number three states that the study must address: "*Whether restoration of the wetland's natural values, including its biological productivity and wildlife habitat features, can most feasibly be achieved and maintained in **conjunction with a boating facility or whether there are other feasible ways to achieve such values."*** (emphasis added). The reference to *"other feasible ways"* relates to consideration of other uses allowed under Section 30233 of the Coastal Act. For example, the study might conclude that the Lowlands could be feasibly restored by establishing it as a mitigation bank. The use of a wetland area for a

mitigation bank would be consistent with Section 30233(a)(7) which allows restoration activities. Section 30411(b) cannot be construed to allow the fill of wetlands for uses that are not identified as allowable in Section 30233. The Appellate Court upheld the Trial Court's findings that "*residential development of the wetlands was not permitted by the Act, even if it would fund restoration of other portions of the wetlands*."

Therefore, the Commission finds that the amended Land Use Plan, as submitted, does not conform with Sections 30233 and 30411 of the Coastal Act since it would allow fill of wetlands for uses not permitted by Section 30233.

ALLOWABLE USES UNDER SECTION 30233 OF THE COASTAL ACT

Figure 16

(l) New or expanded port, energy, and coastal-dependent industrial facilities, including commercial fishing facilities.

(2) Maintaining existing, or restoring previously dredged, depths in existing navigational channels, turning basins, vessel berthing and mooring areas, and boat launching ramps.

(3) In wetland areas only, entrance channels for new or expanded boating facilities; and in a degraded wetland, identified by the Department of Fish and Game pursuant to subdivision (b) of Section 30411, for boating facilities if, in conjunction with such boating facilities, a substantial portion of the degraded wetland is restored and maintained as a biologically productive wetland. The size of the wetland area used for boating facilities, including berthing space, turning basins, necessary navigation channels, and any necessary support service facilities, shall not exceed 25 percent of the degraded wetland.

(4) In open coastal waters, other than wetlands, including streams, estuaries, and lakes, new or expanded boating facilities and the placement of structural pilings for public recreational piers that provide public access and recreational opportunities.

(5) Incidental public service purposes, including but not limited to, burying cables and pipes or inspection of piers and maintenance of existing intake and outfall lines.

(6) Mineral extraction, including sand for restoring beaches, except in environmentally sensitive areas.

(7) Restoration purposes.

(8) Nature study, aquaculture, or similar resource dependent activities.

SECTION 30411(b) OF THE COASTAL ACT **Figure 17**
(b) The Department of Fish and Game, in consultation with the commission and the Department of Boating and Waterways, may study degraded wetlands and identify those which can most feasibly be restored in conjunction with development of a boating facility as provided in subdivision (a) of Section 30233. Any such study shall include consideration of all of the following: *(1) Whether the wetland is so severely degraded and its natural processes so substantially impaired that it is not capable of recovering and maintaining a high level of biological productivity without major restoration activities.* *(2) Whether a substantial portion of the degraded wetland, but in no event less than 75 percent, can be restored and maintained as a highly productive wetland in conjunction with a boating facilities project.* *(3) Whether restoration of the wetland's natural values, including its biological productivity and wildlife habitat features, can most feasibly be achieved and maintained in conjunction with a boating facility or whether there are other feasible ways to achieve such values.*

SECTION 30240 ANALYSIS

Section 30240 requires that environmentally sensitive habitat areas be protected against any significant disruption of habitat values, and only uses dependent on those resources shall be allowed within those areas. Upland areas that are interspersed with wetlands are considered environmentally sensitive habitat areas. Wetlands and the associated upland areas together provide an ecosystem that is vital to fish, waterfowl, other birds, mammals, shellfish, amphibians, reptiles, and many types of vegetation. This includes essential breeding, feeding, and migratory rest stops. Wetland habitats are necessary for the survival of a disproportionately high percentage of endangered and threatened

species. Wetlands and their associated uplands also play vital roles in flood mitigation, aquifer recharge, nutrient creation, and water quality.

Protection of the wetlands at Bolsa Chica are a critical concern. Wetlands for a long time were viewed as unproductive land that needed to be reclaimed for agriculture or other commercial purposes. The result was a severe reduction in the amount of wetlands which has lead to corresponding declines in wildlife and the economic benefits derived from the affected wildlife. Only about 25% of the total wetlands of southern California are believed to still exist, out of 53,000 acres only about 13,000 acres remain. Residential development has been identified as one of the major contributors to the decline in wetlands. Bolsa Chica as it currently exists has lost about 30% of its footprint which was an estimated 2,300 acre estuarine system with its own ocean entrance that existed in 1894. In recognition of wetland acreage losses both Governor Wilson and President Clinton, in August of 1993, released wetland policy statements. These policy statements detailed a series of initiatives designed to achieve three principal goals: 1) ensure no net loss of wetlands, 2) reduce the procedural complexity, and 3) develop private and public partnerships to encourage wetland conservation and protection.

Though urban and oil development have significantly altered the natural character of the wetland ecosystem at Bolsa Chica, the Lowland area still possesses significant habitat values. The Department of Fish and Game determined that the Lowland constitutes a "*fundamentally inseparable wetland system of exceptional value to wildlife*." (Department of Fish and Game "*Determination of the Status of Bolsa Chica Wetlands*", December 11, 1981). Outer Bolsa Bay is particularly renowned for the diversity and numbers of shorebirds utilizing the tidal mudflats. Inner Bolsa Bay is especially valuable for providing suitable conditions for thousands of breeding seabirds, as well as the food source for fish eating birds. The upland edges of Bolsa Chica provide significant habitat value as the transition from marine habitat to terrestrial habitat.

The U.S. Fish and Wildlife Service declared that Bolsa Chica *"Due to its large size, and great potential for ecosystem enhancement, the fate of Bolsa Chica is considered one of the most important coastal fish and wildlife issues of southern California. This rare and unique circumstance at Bolsa Chica has prompted the Service and the Department of the Interior to pursue the idea of biological conservation and habitat restoration of the whole ecosystem, wetlands, and upland habitats, but respecting the private property rights of the current landowners."* (U.S. Fish and Wildlife Service, Consistency Determination for the Bolsa Chica Lowland Acquisition and the Bolsa Chica Conceptual Wetland Restoration Plan, September 1995). The U.S. Fish and Wildlife service recognizes that stemming further habitat loss, wetland and upland, at Bolsa Chica and enhancing the existing ecosystem is highly desirable and feasible purpose that would benefit the people of California and the Nation.

When the Department of Fish and Game issued its findings on "*The Determination of the Status of the Bolsa Chica Wetlands*" the Department concluded that of the 1,324 acres

within the study area, 1,292 acres were historic wetlands and 32 were historic uplands. Of the 1,292 acres of historic wetlands, 852 acres continue to function viably as wetlands. The Department of Fish and Game determined that other 440 acres of historic wetland no longer functioned viably as wetland because the placement of dikes, roads, and shallow fill had converted these former wetlands to agricultural land, roads and pads for oil operations, and uplands. The Department of Fish and Game found that 120 acres of the 440 acres of former wetlands functioned as upland habitat and was environmentally sensitive. The Department of Fish and Game also concluded that the roads and fill areas formed a "*resting substrate for wetland associated wildlife*" and "*narrow ecotones which add to and enhance the diversity of habitat available to wildlife*." (See Department of Fish and Game "*Determination of Status of Bolsa Chica Wetlands*," December 11, 1981). Thus, based upon the Department of Fish and Game determination, and on the importance of the upland areas to the wetlands, the upland areas that are interspersed among the Lowland wetlands are environmentally sensitive habitat areas. Coastal Act section 30240 prohibits the significant disruption of ESHA except for development of uses that are dependent upon the resource. The elimination of 65 acres of ESHA for the construction of housing in the Lowland is a significant disruption of the Lowland ecosystem. Residential development is not a use that is dependent upon ESHA. Therefore, because the Local Coastal Program as submitted would allow a significant disruption of ESHA for a non ESHA dependent use, the Bolsa Chica Local Coastal Program, as submitted, is inconsistent with section 30240 of the Coastal Act.

Required Study by the Department of Fish and Game Never Done

Section 30411(b) of the Coastal Act states that the Department of Fish and Game, in consultation with the Commission and the Department of Boating and Waterways may study degraded wetlands and identify those wetlands which can most feasibly be restored in conjunction with a boating facility (see Figure 17 on page 240). The County of Orange, as discussed previously, asserted that the proposed Lowland residential development was consistent with Section 30411(b) of the Coastal Act.

As previously stated, the study required by Section 30411(b) has not been conducted. The Department of Fish and Game "Determination on the Status of the Bolsa Chica Wetlands" was never designed to function as this study. The report states "*The Department finds that because only limited information is currently available, it can make* ***no determination****, at present,* ***with respect to the feasibility of a boating facility or <u>any other means</u>*** *of restoring and improving wetlands in the area."* (emphasis added). (See page 2 of the Department of Fish and Game report "Determination of the Status of the Bolsa Chica Wetlands", transmitted to the Coastal Commission on December 11, 1981.)

The Department of Fish and Game subsequently participated in the preparation of a Habitat Conservation Plan ("HCP"). A 1983 amendment to the Coastal Act added section 30237, which authorized the Department of Fish and Game to work with the State Coastal Conservancy, Orange County, and landowners to prepare an HCP to submit to the Coastal Commission for the Commission's review and approval. The HCP was developed in conjunction with plans to develop a boating facility at Bolsa Chica. Thus, the DFG never considered whether there were other feasible means for restoring the Bolsa Chica wetlands. Since the Department of Fish and Game has not conducted a study that considers whether there are other feasible means of restoring these wetlands, as specified by Section 30411(b), the Commission finds that Section 30411(b) of the Coastal Act can not be used to support the assertion of the proposed amended Local Coastal Program that residential development in the Lowland is another feasible means of restoring the remaining wetlands at Bolsa Chica.

Conclusion that Residential Development in the Lowlands is Not an Allowable Use

Wetland resources are a very valuable resource which have been adversely impacted by human development. Only about 25% of the wetlands of southern California remain. Bolsa Chica as a wetland ecosystem has lost about 30% of its footprint. The loss of an additional 185 acres would further reduce the ecological value of the Bolsa Chica wetland ecosystem. Section 30233 of the Coastal Act protects wetlands by prohibiting the fill of wetlands except for eight specific uses. Residential development is not one of the uses allowed in a wetland. Section 30233(a)(3) in conjunction with Section 30411 cannot be construed as allowing uses other than those identified in Section 30233. Section 30240 protects environmentally sensitive habitat areas by prohibiting the significant disruption of an ESHA except for uses that are dependent upon the resource. Residential development is not a use dependent upon ESHA resources. Thus, Sections 30233 and 30240 can not be construed to allow residential development in the Lowland of Bolsa Chica. Therefore, the Commission finds that the proposed amended Land Use Plan, which allows residential development in the Lowland is inconsistent with Sections 30233 and 30240 of the Coastal Act.

(d). Proposed Filling of Warner Avenue Pond, Small Isolated Wetlands on Mesa, and a Residual Lowland Wetland Between the EGGW Channel and the Mesa Designated for Residential Development

The Bolsa Chica Mesa contains approximately 2 acres of wetlands. The wetlands located on the Mesa consist of Warner Avenue Pond which is 1.7 acres in size and small isolated pocket wetlands which total about .3 acres. In addition, the U.S. Army Corps of Engineers in early 1998 identified the existence of a previously unrevealed .08 acre

(5200 sq. ft.) "*vernal*" pool on the Mesa. Furthermore, based on the 1989 EPA wetland delineation there is an approximate half acre wetland which is located in a residual lowland area between the EGGW Channel and the Mesa (**Figure 1** on Page 5).

Warner Avenue Pond contains pickleweed and provides habitat for shallow feeders such as mallard, American coot, and various herons. The appropriateness of the wetland designation for Warner Pond have not been a subject of debate. Therefore, there is no dispute that Warner Pond is a wetland, and as such is governed by Section 30233 of the Coastal Act.

The wetland status of the small isolated pockets wetlands which total about .3 acres has been the subject of debate. The Commission found the isolated pocket wetlands qualify as wetlands under Coastal Development Permit 5-90-1143 due to the presence of wetland vegetation. The U.S. Army Corps of Engineers, however, in 1994, deleted the pocket wetlands as qualifying for "*waters of the United States*" designation since they did not possess all three required wetland characteristics based on the Corps methodology. Though a wetland may not qualify as "*waters of the United States"* under the Corps criteria, the Commission's wetland criteria for defining wetlands still permits such a finding. In September 1999 a new wetland delineation of the pocket wetlands on the Bolsa Chica Mesa was prepared by Glenn Lukos Associates. This new wetland delineation is based on Commissions wetland criteria. According to this recent delineation only one of the previously identified pocket wetlands still qualifies as a wetland. Commission staff conducted a site visit on November 15, 1999 to verify the wetland delineation of Glen Lukos Associates. Commission staff concurs with the Glen Lukos Associates wetland delineation. Based on the evidence presented, the Commission concurs with the September 1999 findings by Glenn Lukos Associates that only site number two (**Figure 1** on Page 5) still qualifies as a wetland.

The status of the recently identified "*vernal*" pool has also been the subject of debate. The location of the 5200 sq. ft. "*vernal*" pool is identified in **Figure 1** (on Page 5) as a "*seasonal wetland*". The definition of a vernal pool based on the Corps' criteria is a wetland that is seasonally ponded in small depressions as a result of a shallow, relatively impermeable layer which restricts downward percolation of water. The dominant water source for vernal pools is precipitation with pools typically filling after fall and winter rains and evaporating during spring and summer. These seasonal ponds are fragile, easily disturbed ecosystems that provide habitat for indigenous specialized assemblages of flora and fauna, including several species which are either proposed or already Federally listed as threatened or endangered.

The Commission's definition of a vernal pool, contained in the Statewide Interpretive Guidelines, is a small depression usually underlain by some subsurface layer which prohibits drainage into the lower soils profile, in which during the rainy season, water may stand for periods of time and contains vegetation normally associated with vernal pools.

An area of ponding which was present in early 1998 possessed all three wetland characteristics required by the Army Corps of Engineers to designate an area as wetland. According to the Corps, the site possessed hydrophytic vegetation, had a restrictive soil layer, and saturated soils above the restrictive layer. Furthermore, the Corps noted the presence of fairy shrimp in the pool. Unlike the Corps, Commission wetland criteria only requires the presence of one wetland parameter to make a wetland determination. Therefore, any area designated by the Corps as a wetland will qualify under the Commission's criteria as a wetland.

In response to the Corps wetland determination, Glenn Lukos Associates prepared an evaluation asserting that the "*vernal*" pool designation was inappropriate since the observed ponding was of an anthropogenic origin, the lack of historic ponding on a continual basis, the assertion that the site has only marginal soil conditions conducive for vernal pool habitats, and that it does not support plant or animal species which are reliable indicators of vernal pools in southern California. According to the Glenn Lukos Associates report, "*The fairy shrimp identified onsite (Branchinecta lindahli) is the most common anostracan in North America and in California can invade existing vernal pool habitats to the detriment of endemic species."*

Overall, there apparently is no consensus regarding the application of the terms "*vernal pool*" and "*seasonal pool*" or "*seasonal wetland*". However, "*vernal pools*" are generally defined by the presence of a particular suite of species, including such indicators as little mousetail (Myosurus minimus), round woolyheads (Psilocarphus brevissimus), and several species of *Downingia* and *Navarretia* (Sawyer, J.O. and T. Keeler-Wolf.,1995. A Manual of California Vegetation. California Native Plant Society, Sacramento). "Seasonal pool or wetland" is most often used in a more generic sense to refer to any area that is seasonally inundated or saturated and supports a preponderance of hydrophytes, including widespread species not typically a part of the vernal pool community. The wetland species observed at the seasonal wetland (**Figure 1** on Page 5) were rabbits foot grass (*Polypogon monspeliensis*), brass buttons (*Cotula coronopifolia*), *Lythrum hyssopifolia*, curly dock (*Rumex crispus*), and *Callitriche hermaphroditica*. All but the latter are non-native wetland plants. Therefore, Commission staff would characterize this habitat as a seasonal wetland. Based on the available evidence, the Commission finds that the .08 acre "*vernal pool*" is a wetland based on the Commission's criteria and subject to Section 30233 of the Coastal Act.

Finally, there exists a small area which gives the impression that it is part of the Mesa, but is actually a residual portion of the lowland since it is located between the EGGW Channel and the top of the Mesa. This area contains approximately half an acre of wetland vegetation based on the based on the 1989 EPA wetland delineation. According to the Existing Habitat Map (Figure 3.1-1) of the LCP this area contains pickleweed. The Department of Fish and Game (March 16, 1998) concurred with the findings of Frank Hovore and Associates that the site possessed wetland vegetation. The areal extent of

the wetland vegetation, however, was not stated since "*The exact dimensions of this area as it now exists or its size prior to recent disturbances was not discussed in any great detail during the pre-project planning meeting."* The Parkside Estates EIR notes that only two small patches of pickleweed remained and that the pickleweed patches were very limited in overall extend and were highly disturbed. Based on the Commission's wetland methodology for delineating wetlands, the Commission finds that the wetlands exist at this site as identified in (**Figure 1** on Page 5).

As originally submitted in June 1995, the LCP proposed the construction of 2,400 residential units and the widening of Warner Avenue which would have resulted in the fill of all the wetlands identified above. This wetland fill raises concerns with Section 30233 of the Coastal Act which does not allow the fill of wetlands for purposes of residential development.

The first concern involves Warner Pond. There is no disputing that Warner Pond is a wetland, and as such is governed by Section 30233 of the Coastal Act. Section 30233(a)(5) states:

> *(a) The diking, filling, or dredging of open coastal waters, wetlands, estuaries, and lakes shall be permitted in accordance with other applicable provisions of this division, where there is no feasible less environmentally damaging alternative, and where feasible mitigation measures have been provided to minimize adverse environmental effects, and shall be limited to the following: (5) Incidental public service purposes, including but not limited to, burying cables and pipes or inspection of piers and maintenance of existing intake and outfall lines.*

Warner Pond also qualifies as an environmentally sensitive habitat area (ESHA), and is therefore afforded protection under Section 30240. Section 30240 of the Coastal Act states:

> *(a) Environmentally sensitive habitat areas shall be protected against any significant disruption of habitat values, and only uses dependent on those resources shall be allowed within those areas. (b) Development in areas adjacent to environmentally sensitive habitat areas and parks and recreation areas shall be sited and designed to prevent impacts which would significantly degrade those areas, and shall be compatible with the continuance of those habitat and recreation areas.*

When the Commission acted on the Bolsa Chica LCP submittal in January of 1996, it concluded the following:

> *The fill of Warner Avenue Pond can be found to be an allowable use under Section 30233(a)(5) since Warner Avenue (a public road) is proposed to be widened. Widening of an existing road to accommodate traffic is an incidental*

public service. The Bolsa Chica Local Coastal Program states that Warner Avenue will need to be widened with or without the buildout of Bolsa Chica Mesa. Regional growth is the driving force for widening of Warner Avenue. Following residential buildout of the Mesa, Warner Avenue Pond will become an isolated wetland area adversely impacted by adjacent urban development. Further, consistent with Section 30233, the widening of Warner Avenue when compared to building the Cross-Gap connector through the Lowlands is clearly preferable as the least environmentally damaging alternative. The Cross-Gap connector was approved in the 1986 Land Use Plan as an arterial road to accommodate area traffic. The Cross-Gap connector, however, would have been built through the Bolsa Chica Lowlands which would have adversely affected the wetlands. By not building the Cross-Gap connector the integrity of the Bolsa Chica lowlands as wetland habitat is preserved and adverse impacts by adjacent urban development are minimized. However, adequate mitigation has not been proposed under the current Land Use Plan amendment to minimize the adverse environmental effects of Mesa wetland fill.

Since the Commission acted on this issue in January of 1996, the Court found that the Commission's decision to permit the filling of Warner Pond was inconsistent with Section 30240 because the filling of the pond will cause a significant disruption of habitat values and the proposed expansion of Warner Avenue which necessitated the filling is not a use dependent on the pond's resources. On the other hand, the Court did not disagree that since the pond is a wetland, Section 30233(a)(5) applies, and it permits the fill of wetlands for incidental public services. The Court concluded that the policies of Section 30233(a)(5) and 30240 are in conflict as applied to Warner Pond. Therefore, the Commission was instructed to resolve the conflict in its findings. However, since the Court's decision, Orange County has found (through a review of the previous traffic study in a letter dated September 9, 1997 by RKJK Associates (Exhibit 3)) that a reduction in the residential density on the Mesa and the elimination of the commercial development on the Mesa would not create traffic impacts that necessitate the need to widen Warner Avenue which was the basis for allowing the filling Warner Avenue Pond. Thus, there is a feasible, less environmentally damaging alternative to the proposed Land Use Plan policies of allowing the fill of Warner Pond in order to widen Warner Avenue. The alternative, reducing Mesa density to 1,235 residential units avoids the widening Warner Avenue, thereby avoiding the need to fill Warner Avenue Pond. Since there is a feasible alternative that can avoid wetland fill, the proposed policies allowing the fill of Warner Avenue Pond must be denied.

Second, as originally submitted in June 1995, the Bolsa Chica LCP proposed the fill of the pocket wetlands on the Mesa for residential development. At the Commission's January 11, 1996 meeting, the Commission found in it's Land Use Plan denial findings that the LCP, as submitted, failed to provide adequate mitigation for the fill of the wetlands and that the fill of the pocket wetlands, even though not allowed by Section 30233, could be found consistent with the Coastal Act by utilizing the balancing provision of section 30007.5 of the Coastal Act. The Commission found this finding possible since

buildout of the Mesa would leave very little remaining biological values for these small isolated wetlands due to the proximity of the residential buildings and the adverse impacts associated with the homes such as: human intrusion, domestic pet intrusion, introduction of pollutants from nearby development, noise and lighting. Further, the Commission found that concentrating residential development on the Mesa would avoid adverse impacts to the Lowland which would be beneficial for preserving the Lowland area as a wetland ecosystem. In the approval findings for the January 11, 1996 meeting, the Commission required that the fill of the pocket wetlands be mitigated at a ratio of 4:1, so that for every acre of wetland filled, four new acres of wetland would be created.

Since the Bolsa LCP was originally submitted in 1995 the status of the Mesa wetlands has changed. Only one of the original Mesa pocket wetlands is deemed to currently exist, a new seasonal wetland has been determined to exist on the Mesa. In this rendition of the denial findings, the Commission finds that, as originally proposed in the June 1995 LCP submittal, the fill of the wetlands for proposed residential development is inconsistent with Section 30233 of the Coastal Act. Next the Appellate Court determined in April 1999 that the Coastal Act does not permit the destruction of an environmentally sensitive habitat area (ESHA) simply because the destruction is mitigated offsite. The prior version of the Bolsa Chica LCP allowed the pocket wetlands to mitigated off-site. The Court went on to state that there must be some showing that the proposed destruction of the resource which is at risk is needed to serve some other environmental or economic interest recognized by the Coastal Act. No such claim was asserted in the LCP, as submitted in June 1995. Therefore, for the reasons cited above the Commission finds that, as submitted, the amended Land Use is inadequate to implement the applicable policies of the Coastal Act regarding the protection of wetlands.

b. Approval as Modified

(1). Establishment Of Buffers Resolves The Conflicts Between Proposed Residential Development, The Wetlands, and ESHA Areas

The Bolsa Chica Mesa is an ecological system that contains wetlands and environmentally sensitive habitat areas. Wetlands and environmentally sensitive habitat areas are not isolated independently functioning systems. They depend upon and are highly influenced by their surroundings. Consequently, non-ESHA areas can be critical to the continued functioning of ESHA areas. Determining an adequate buffer to maintain ESHA and wetland areas requires an ecological approach for managing habitat. This means that the designation of and management practices for protecting an environmentally sensitive habitat area requires that it be accomplished in conjunction with protecting adjacent habitat areas that critically affect the important functions of the ESHA.

Habitats can not be compartmentalized as they function as interrelated systems. For example the Eucalyptus trees growing on the Mesa have no intrinsic need for protection as a species. However, the physical structure that they provide is utilized for nesting or perching by at least 12 of the 17 species of raptors that are known to occur within the Bolsa Chica area. Some of the raptors that utilize the Eucalyptus trees forage in the wetlands, some forage in the mesa grasslands, and some forage within the coastal sage scrub community along the bluff edge. If these foraging areas are eliminated or compromised by urban development they affect the ability of the ESHA areas to function effectively. Consequently, certain habitat areas, even if they are not ESHA areas are critical to the functioning of an ESHA area such as the Eucalyptus grove. Section 30240 requires that development not adversely affect ESHA areas and that development be sited in a manner which minimizes adverse impacts to ESHA areas.

As discussed further below, to assure that sensitive environmental resources are protected, the Commission finds that it is necessary to protect the lower bench of the Bolsa Chica Mesa (as depicted in **Figure 1** on Page 5). Additionally, the Commission finds that the proposed residential development be limited to the upper bench of the Bolsa Chica Mesa. To assure that the residential development on the upper bench will not have an adverse impact on the lowland wetlands, a buffer of 100 feet shall be provided inland from either the bluff top or the inland edge of the Eucalyptus grove (as depicted in (**Figure 1** on Page 5) whichever is the greatest distance. To assure that the residential development will not have an adverse impact on the lower bench of the Mesa, a fifty (50) foot buffer shall be established inland of the beginning of the upper bench (as depicted in (**Figure 1** on Page 5).

The 100 foot buffer and the fifty foot buffers are appropriate in this case for the following reasons. As discussed in greater detail in sections that follow, the Commissions finds that residential development must be concentrated on the upper bench of the Bolsa Chica Mesa. Limiting residential development to the upper bench preserves the lower bench as a component of the overall Bolsa Chica wetland/upland ecosystem. The preservation of the lower bench as natural open space is vital to the functioning of the existing ESHA resources which are principally found on the lower bench. Though buffers on the upper bench will not totally eliminate the adverse impacts of residential development, they will still minimize the disturbance that would be created by adjacent urban development on wetlands and other environmentally sensitive habitats through horizontal spatial separation, will provide a transitional zone between natural habitat areas and urban development, and will provide visual screening.

The establishment of a 100 foot horizontal buffer on the upper bench from either the ESHA or inland from the Mesa bluff edge facing Outer Bolsa Bay will provide the benefits summarized below:

- **Habitat Buffer** for habitat resources along Mesa bluff edge.

- **Visual Buffer to Minimize Visual Presence to Wildlife**: The vertical relief of the bluff and the vegetation screening protects nearby wildlife in the lowlands from the visual perception of human presence while still allowing more distant views from the public trail for educational/passive recreation purposes.

- **Physical Buffer to Minimize Human and Domestic Animal Intrusion into the Lowlands**: fencing, slope and vegetation provide barriers .

- **Noise Buffer**: No adjacent roads, elevation and bluff setback, No Mesa Park active use and parking areas located away from the bluff edge.

- **Access Regulation**: Well-defined trail system with clear public use regulations, including limiting access near sensitive species and sensitive habitat.

For the reasons cited above, the Commission finds that if the amended Land Use Plan is modified for the upper bench to include either a 100 foot buffer from the bluff edge or the Eucalyptus grove (whichever is the greater distance), and a fifty foot buffer inland from the top of where the upper bench begins as shown in (**Figure 1** on Page 5), the amended land use plan can be found consistent with Sections 30231, 30233, and 30240 of the Coastal Act.

To incorporate the bluff and wetland protection concepts discussed above, the Commission is modifying County Policy 3.1.2.6 (as submitted) to clarify that buffers shall provide a transition zone between the resources to be protected and urban development. Policy 3.1.2.6 (as submitted) will also be modified to include the concept that the buffer areas are not in themselves a part of the environmentally sensitive habitat area to be protected. To specify buffer widths, County Policy 3.1.2.6 (as submitted) a buffer of 100 feet inland from either the Eucalyptus Grove ESHA or the bluff top edge (whichever is the greater distance) overlooking the lowland shall be established. A buffer of fifty feet inland shall be established at the top of the hill which separates the upper bench from the lower bench of the Bolsa Chica Mesa. The application of these buffers is depicted in **Figure 1** on Page 5. Landscaping vegetation within the buffer will be limited exclusively to drought native vegetation that will provide habitat value and will be visual compatibility with the adjacent wetlands. Public trails and low-intensity interpretive signage will be allowed in portions of the buffer areas, specifically on the upper bench, the twenty-five feet closest to residential development. Public trails permitted within the buffer areas are discussed in the under the Public Access and Visitor Serving Component (Page 283). Public trails are consistent with the buffer concept, as buffers provide a transition from the natural environment to the urban environment.

The Commission finds that, only as modified is the Resource Restoration and Conservation Components chapter of the amended Land Use Plan consistent with the applicable Chapter 3 policies of the Coastal Act.

(2). Environmentally Sensitive Habitat Values Preserved

The Bolsa Chica Mesa is an ecological system which contains wetlands and environmentally sensitive habitat areas interspersed with non-ESHA areas. The denial findings determined that the Bolsa Chica LCP as submitted failed to effectively protect the ecosystem as it would have allowed residential development to disrupt the ecosystem. Section 30240 mandates that environmentally sensitive habitat be protected against any significant disruption of habitat values. Section 30240 also goes on to state that development adjacent to environmentally sensitive habitat areas must be designed and sited to minimize adverse impacts. The U.S. Fish and Wildlife Service stated in 1979 that "*Bolsa Chica is still an integral and valuable component of California's coastal wetlands. The Bolsa Chica wetlands and bordering mesas provide suitable habitat for invertebrates, amphibians, reptiles, fish, birds, and mammals. It is a major wintering area for migratory waterfowl and shorebirds. The Bolsa Chica provides resting, feeding, and breeding habitat for several Federal and State endangered species*." The U.S. Fish and Wildlife Service then went on to state that the residential and commercial development which had been proposed at that time (1979) would result in the destruction of one of the last remaining viable wetland-bluff ecosystems in southern California.

Though the preceding assessment is now over 20 years old it is still pertinent today. Dr. Findlay of the University of Ottawa in a letter (Exhibit 15) to the Commission (date stamped Feb. 9, 2000) reiterates this concept and states that an ecological approach must be taken as wetlands are not isolated and that his research suggests that adjacent urban development of up to one kilometer from a wetland can have noticeable and significant impacts on wetland biodiversity. He also states that his research suggests that the adverse impacts of development is not seen immediately; rather it may take decades before the full impacts are revealed.

The Eucalyptus grove is considered an ESHA because it provides raptor habitat. Habitat value of the Eucalyptus grove are based on: areal extent, species diversity, nesting sites, and roosting opportunities. The Commission, in previous Bolsa Chica Land Use Plan decisions had considered the off-site re-creation of an ESHA as an acceptable method of preserving habitat values when proposed development would significantly affect the value of the existing ESHA. Further, the Commission believed that the replacement habitat would be more beneficial in the long run as the habitat value of the Eucalyptus grove had been declining both in areal extent and in habitat value, that Eucalyptus trees are non-native, and that the replacement ESHA, in the long run, would be more beneficial since it would consist of native plants adequately separated from urban development.

The proposed replacement native habitat was to be 20 acres in size. This Commission decision to allow the destruction and recreation of an ESHA became one topic of a lawsuit filed against the Commission. The Trial Court concurred with the Commission's

findings that the destruction and recreation of the ESHA would not result in a significant disruption of habitat value. The Appellate Court, however, found that the Coastal Act does not permit the destruction of an environmentally sensitive habitat area (ESHA) simply because the destruction is mitigated offsite. The court went on to state; that at the very least, there must be a showing that the destruction of the ESHA is needed to serve some other environmental or economic interest recognized by the Coastal Act.

Though not designated as ESHA, the Bolsa Chica Mesa also contains habitat types which include sensitive or rare plant communities. For example, the Southern Tarplant is known to exist on both the upper and lower bench. According to Robert Hamilton the Conservation Biologist for the Orange County Native Plant Society, the California Natural Data Diversity Data Base specifies two occurrences of this plant dating from 1993. One occurrence, consisting of three colonies and about 500 plants, lies “south of Warner Avenue and east of Bolsa Bay”. The other consisting of two colonies and about 45 plants lies “south of Los Patos Avenue and west of Bolsa Bay”. Many more plants were present in 1999 and 2000 (

Figure 18 on Page 260)

Another important plant community on the Mesa is the Coastal Sage Scrub community. This plant community is found along the southwest bluff slope of the Bolsa Chica Mesa. In 1979 the U.S. Fish and Wildlife Service referred to this community as "…*the most threatened upland vegetative type in southern California because of extensive urban developments*." This vegetation type is rare and easily disturbed by human activities.

Concentration of Residential Development on the Upper Bench of the Bolsa Chica Mesa.

Based on the specific analysis contained in this report, the Commission finds that the Bolsa Chica Mesa consists of an integrated ecosystem. Consequently specific areas can not simply be protected based on one defined biological issue such as preservation of the Eucalyptus grove for the benefit of raptors. To maintain the functionality of the Bolsa Chica Mesa as an ecosystem an area large enough to provide a wide range of habitat values must be protected. Current research also dictates that the area to be preserved for conservation must be connected to larger areas of habitat, that it should not be fragmented, and that it should be concentrated to minimize the perimeter to area ratio. The Commission therefore finds, to protect the ability of the Bolsa Chica Mesa to function effectively as an ecosystem that the lower bench of the Mesa be designated as Conservation (**Figure 1** on Page 5)and that residential development must be concentrated on the upper bench consistent with the provisions of Coastal Act section 30250 which require that all development be concentrated in close proximity to existing developed areas.

Concentrating residential development on the upper bench will have some adverse biological impacts. Adverse impact resulting from concentrating development on the upper bench would be the fill of the seasonal wetland by Los Patos (**Figure 1** on Page 5), the elimination of some Eucalyptus trees along Bolsa Street (**Figure 1**), and the loss of Southern Tarplant located on the upper bench. However, as discussed further below, concentrating development on the upper bench of the mesa in close proximity to existing developed areas and conserving the lower bench of the mesa is more protective overall of significant coastal resources than protecting each specific habitat area in conjunction with development of the entire mesa.

Section 30007.5 of the Coastal Act states:

> *The Legislature further finds and recognizes that conflicts may occur between one or more policies of the division. The Legislature therefore declares that in carrying out the provisions of this division such conflicts be resolved in a manner which on balance is the most protective of significant coastal resources. <u>In this context, the Legislature declares that broader policies which, for example, serve to concentrate development in close proximity to</u>*

> *urban and employment centers may be more protective, overall, than specific wildlife habitat and other similar resource policies.* (emphasis added).

Consequently, the Commission can utilize Section 30007.5 to resolve a conflict in the protection of resources in a manner which is most protective of significant coastal resources overall. Concentrating residential development on the upper bench of Mesa would achieve two beneficial objectives. First it would concentrate urban development next to an area which has already been developed. Second, it would preserve the lower bench of the Bolsa Chica Mesa which is immediately adjacent to significant habitat. This maintains the lower bench of the Bolsa Chica Mesa as part of the overall Bolsa Chica ecosystem.

In comparison, the biological resources to be lost consist of the seasonal wetland by Los Patos, Southern Tarplant (upper Mesa bench), and Eucalyptus trees adjacent to Bolsa Chica Street. The seasonal wetland as it currently exists is significantly degraded, but provides some ecological values including habitat for Southern Tarplant. According to Glenn Lukos Associates report of October 4, 1999 some of the wetland vegetation identified consisted of rabbitsfoot grass, hyssop loosestrife, curly dock, brass buttons, and water starwort. Rabbitsfoot grass and hyssop loosestrife are considered opportunistic non-native species as are curly dock and brass buttons. Water starwort though a native species exhibits widespread distribution. However, even if protected in place, following residential development these resources would become isolated and their sustainability affected by the residential development over the long term.

The Commission acknowledges that it often places open-space buffers around sensitive resources to protect those resources from the direct impacts of development and to conserve associated important habitat values. Such an approach is incorporated into the development plans in the County's submission and in Hearthside Homes modified plan. However, at Bolsa Chica the mesa provides so many important ecological functions that are dependent on the existence of a large contiguous block of habitat that the Commission finds that the use of traditional buffers strips is not a feasible approach. Besides being adjacent to extensive wetlands, the mesa directly provides habitat for raptors, coyotes, southern tarplant, and black-tailed jackrabbits, each of which is either rare, important because of known ecological functions, or both. The mesa also has the potential to provide many crucial upland-wetland linkages. The following discussion provides more specific rationale for the Commission’s finding that concentrating development on the upper bench of the mesa in close proximity to existing developed areas and conserving the resources on the lower bench of the mesa is more protective overall of significant coastal resources than protecting each specific habitat area in conjunction with development of the entire mesa.

Raptor Habitat

One of the major resource goals is to minimize the impacts of development on the raptors that occur at Bolsa Chica. At the request of staff of the Coastal Commission and Department of Fish and Game, Hearthside Homes agreed to fund an independent assessment of these issues. The reviewers were Brian Walton of the University of California at Santa Cruz Predatory Bird Research Group, Ronald Jurek, a wildlife biologist with the Department of Fish and Game, and Peter Bloom an independent raptor research biologist. Each reviewer received the same instructions and background materials and assessed the effects on raptors of three development scenarios - the County's original plan (**Figure 3** on Page 16), Hearthside Homes' modified plan with wider buffers (**Figure 4** on Page 22), and staff's recommendation to conserve the lower bench ((**Figure 1** on Page 5)). The reviewers did their work independently without conferring with each other, the agencies, Hearthside Homes, or public organizations or individuals. Their reviews are contained herein as Exhibits **21**, **22**, **23**, and are the basis of much of the following discussion.

The importance to raptors of the Eucalyptus trees that line the southern bluff of the mesa has been recognized for over 20 years[19]. The trees serve as roosting sites, nesting sites or hunting perches for many of the 20 or so species of raptors and herons that have been observed at Bolsa Chica[20]. Most of the trees that are present have been mapped as ESHA[21] and staff believes that all the Eucalyptus that are present fall within that category. Perhaps because of the long-time designation as ESHA and because of the recent court case concerning Bolsa Chica, there has been a tendency to focus attention primarily on the Eucalyptus trees when discussing raptors at Bolsa Chica. Ecologically, this focus is too limited. Mr. Jurek points out that the ESHA, "...is not the raptor habitat itself." "The ESHA is a zone of trees with good perching and nesting conditions <u>within</u> raptor habitat." Depending on the species, the raptor habitat encompasses the mesa, the lowlands, or portions of both areas. Without those critical foraging areas, the Eucalyptus trees have little significance for raptors. The predominant vegetation on the mesa is non-native grassland, which provides habitat for the insects, birds, and rodents that are the major prey of many raptors. Despite the exotic nature of the dominant vegetation, this type of habitat is generally recognized as important by the resource agencies and they often recommend mitigation[22] for its loss because, "Raptor foraging areas are a declining

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[19] U.S. Fish and Wildlife Service. 1979. Special Report: Bolsa Chica Area. A report dated May, 1979; California Department of Fish and Game. 1982. Environmentally sensitive areas at Bolsa Chica. A report to the California Coastal Commission dated June 3, 1982.

[20] Bloom, P. 1982. Raptor inventory and habitat assessment for the Bolsa Chica Area, Orange County, California. A report to the U. S. Fish and Wildlife Service; McGaugh, C. 1999. Raptor habitat assessment of the Bolsa Chica mesa. A report from Tierra Madre Consultants to the Bolsa Chica Land Trust dated December 5, 1999; Bloom, P. 2000. Solicited letter to John Dixon concerning raptor use of Bolsa Chica habitats dated March 21, 2000; Homrighausen, A., R. Erickson, and B. Walton. 2000. Analysis of raptor and special interest species use of the Bolsa Chica area, including the mesa. A draft report from LSA Associates to Hearthside Homes dated June 16, 2000.

[21] LSA and Integrated Forestry. 2000. Eucalyptus ESHA preservation and management plan, Bolsa Chica, Orange County, California. A report to Hearthside Homes dated June 16, 2000.

[22] For example, the CDFG recommended 0.5:1 mitigation for loss of non-native grassland raptor foraging habitat at Hellman Ranch (Letter from William Tippets to David Bartlett dated June 19, 2000)

resource and impacts to this habitat may be considered significant." [23] The EIR stated that, "In the case of Bolsa Chica, the raptor foraging habitat may be considered sensitive because it plays a valuable role in sustaining the migratory population of raptors." [24] A similar opinion was expressed by Peter Bloom who pointed out that, "...on the local and regional scale, the grasslands at Bolsa Chica are the principal reason for the abundance of raptors, and therefore could be considered an environmentally sensitive habitat area." [25]

Mr. Bloom's comment highlights the importance of scale. On a state-wide scale, as Mr. Walton points out, development at Bolsa Chica is not a threat to the continued survival of any raptor species. However on a local and perhaps regional scale, it is clear from all the reviews that the foraging habitats on Bolsa Chica mesa are very important to insure the continued presence of both breeding and wintering groups of raptors. Mr. Walton estimates that Bolsa Chica and adjacent foraging habitats could potentially support 1 to a few breeding pairs for 14 species. However, due to the degraded nature of the Eucalyptus Tree ESHA caused by unhealthy trees and human disturbance, only a single breeding pair of each of four species have actually nested in the ESHA recently, and not all species have been present each year. Therefore, any significant loss of habitat or increase in disturbance will probably reduce nesting even further. As a result, there is only the potential for small overall differences in the impacts of the various development plans on breeding birds. Nevertheless, Mr. Walton concludes that only the plan recommended by staff "...seems to offer hope of continued use of the area for breeding." Both Mr. Jurek and Mr. Bloom concur in this assessment. The lesser impact of the plan staff recommends is particularly important for the white-tailed kite, which is rare and increasingly threatened in southern California. White-tailed kites regularly nest at Bolsa Chica, rely heavily on the upland habitats and are very sensitive to disturbance.

The most significant impacts of development will probably be to migrant and wintering populations of raptors, especially red-tailed hawks and white-tailed kites. Mr. Bloom points out that, "Bolsa Chica, Ballona Marsh and uplands, and Naval Weapons Station, Seal Beach (NWSSB) provide the last large remnants of coastal natural open space after birds depart the Santa Monica Mountains to the north and Newport Bay from the south." Red-tailed hawks and white-tailed kites appear to have concentrations at Bolsa Chica similar to those at Seal Beach, largely due to the presence of substantial upland habitat. At Newport Bay most upland habitat has been lost to development and only a small population of wintering raptors is now present.

It is obvious that removing a large portion of the upland foraging habitat will have some negative effects on raptors. On the other hand, it is not possible to predict with any reasonable certainty the specific effects that the proposed changes will have on the

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[23] W. Tippets, 2000, op. cit.

[24] Page 4.8-50 in, Orange County Environmental Management Agency. 1996. 1996 Recirculated draft environmental impact report for the Bolsa Chica project. County project number 551. State Clearinghouse number 93-071064. A report dated March 21, 1996.

[25] Bloom, March 21, 2000, op.cit.

various raptors that occur at Bolsa Chica. However, all the reviewers agree that the plan that preserves the greatest foraging habitat (staff's recommendation) will have the least impact on wintering raptors. Mr. Bloom provided rough estimates of the relative magnitude of effects. For red-tailed hawks, he predicts an 80% loss of wintering birds under the County's plan and Hearthside Homes' modified plan, both of which allow development throughout the mesa, compared to a 30% loss under the plan recommended by staff, which concentrates development on the upper bench and conserves the lower bench.

Effects of Raptors on Endangered Species

Mainly due to enormous losses of habitat over the past century, many coastal species have become rare and threatened with extinction, either regionally or globally. These include both prey and predators. Habitat loss and fragmentation have also tended to concentrate species in the few large islands of habitat remaining. This has resulted in the extremely unfortunate situation where the needs of sensitive species conflict with one another. Peregrine falcons (Ca endangered) eat marbled murrelets (Ca Endangered). Burrowing owls (Ca Special Concern) eat least terns (Ca Endangered). Forester's terns (Audubon Watch List) crowd out least terns. The list is becoming long. At the Bolsa Chica lowlands, there are significant populations of breeding least terns and snowy plovers, and many of the raptor species that occur at Bolsa Chica are known to prey upon the chicks of terns and plovers. This occurs in the spring and summer when raptors and sea and shore birds are all breeding and feeding young. Predation by nesting raptors can be a very significant source of chick mortality and is a management issue throughout southern California. Mr. Jureks discusses this conflict in his review. At Bolsa Chica, American kestrels have been the greatest problem from year-to-year, although a breeding red-tailed hawk did substantial damage in 1991. White-tailed kites have not been a problem.

What are the probable indirect effects of development on the listed species in the lowlands? With any development on the mesa there will be some reduction of raptor use at Bolsa Chica, so there is no reason to think that there would be an increase in predation resulting from an increase in breeding pairs of raptors (wintering raptors are not a threat). In terms of raptor numbers, development will probably reduce predation pressure in the lowlands. However, there may be also be a spatial shift in foraging with the opposite effect. One of Mr. Jurek's principal concerns is that loss of upland foraging habitat will result in increased foraging pressure on the remaining habitats including the Bolsa Chica wetlands. In his opinion, the plan recommended by staff will have the least negative effect on endangered species protection efforts. Mr. Bloom thinks it more likely that the loss of upland foraging habitat will simply reduce the number of individuals present.[26] Regardless of the specific effects of habitat loss on foraging patterns, it is

[26] Bloom, March 21, 2000, op.cit.

clear that conserving the lower bench will not result in any increase in the mortality of endangered wetland birds.

Southern Tarplant

The Bolsa Chica Mesa is also home to a rare annual plant [27], *Hemizonia parryi ssp. australis*, commonly known as southern tarplant or southern spikeweed. According to Fred Roberts[28], southern tarplant is thought to have been previously, "..widespread and ubiquitous within the region of the Los Angeles Basin in the vicinity of Santa Monica southeast to Tustin and Irvine."[29] Southern tarplant tends to occur in areas that are seasonally wet and the natural habitat may have been vernal pools.[30] Only about 30 populations are still known to exist. Most of these are small (< 1000 individuals) and at least 12 populations are currently threatened by development. At Bolsa Chica the population has fluctuated widely from year-to-year. In 1991, no plants were found. In 1992, southern tarplant was again present and in 1993 around 545 individuals were observed. There were no detailed surveys until recently. In 1999 and 2000, consultants for Hearthside Homes conducted careful surveys of the entire mesa (

[27] Designated by the California Native Plant Society as a 1B species (Plants rare, threatened or endangered in California and elsewhere, and eligible for state listing) and previously designated by the U.S. Fish and Wildlife Service as a category 2 species (potential candidate but information on vulnerability and threat insufficient). The candidate 2 category is no longer used.

[28] From 1991 to 1999 Fred M. Roberts was a botanist for the U.S. Fish and Wildlife Service where he worked on rare plant issues, including issues related to southern tarplant. He currently is an independent consulting botanist.

[29] Roberts, F.M. 2000. Southern tarplant (*Hemizonia parryi* ssp. *australis*) on the Bolsa Chica AMesa, Orange County, California. An undated report to the Bolsa Chica Land Trust.

[30] Wayne Ferren (U.C. Santa Barbara Museum of Systematics and Ecology), personal communication to John Dixon on October 28, 2000

Figure 18 on Page 260). They counted 3,401 individuals in 1999 (including 161 on the Fish and Game Reserve) and 9,293 individuals in 2000 (including 855 in the vicinity of the seasonal wetland on the upper mesa and 1,573 on the Fish and Game Reserve). Besides annual variations in number, the locations of the denser stands also varied considerably from year to year. These existing data indicate the extreme temporal and spatial patchiness in the distribution of this rare plant that must be considered in any protection plan. Mr. Roberts explains the significance of this variability as follows:

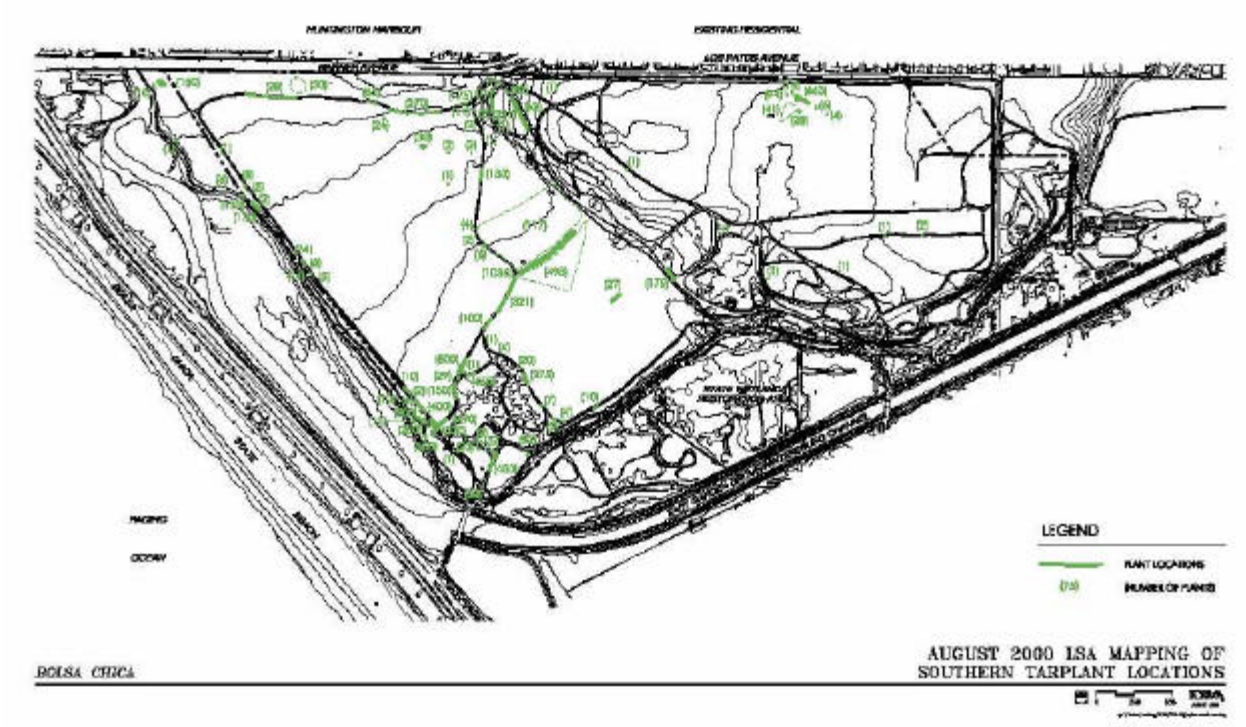
> "*This variation in response to climatic and other influences significantly increases a species potential for surviving unfavorable times. Species may produce prodigious amount of seed one favorable year to weather a more typical 4-5 contiguous unfavorable years. Likewise, seeds with slightly different genetic codes will exploit slightly different germinating conditions. All this increases the vigor and potential of the species. The population that is in evidence one year may represent only a fraction of the total seed bank potential, both in number and in area. If conservation does not consider enough habitat for population dynamics, only a small fraction of the seed bank will be protected and this will significant (sic) reduce the potential for the species to survive hard times*."

There are only about five populations in existence known to have over 8,000 individuals. The Bolsa Chica population is therefore of major significance to the species. Simply preserving one portion of the mesa that had large numbers of individuals this year or any given year provides no assurance that the viability of the population will be maintained. It is important that the range of micro-habitats supporting the species be protected. It is also important to preserve sufficient habitat to insure that populations of pollinators are maintained. In the case of southern tarplant, pollination biology is unknown, however native bees are the pollinators for several related species. Native bees are also pollinators for rare saltmarsh species such as saltmarsh bird's beak[31] and saltmarsh goldfields,[32] making preservation of adequate habitat for pollinators doubly important.

[31] Parsons, L.S. and J.B. Zedler. 1997. Factors affecting reestablishment of an endangered annual plant at a California salt marsh. Ecological Applications 7:253-267.

[32] Letter from Wayne Ferren to staff ecologist John Dixon dated October 28, 2000 re: wetland edges, transitions, and upland habitats.

Figure 18 Tarplant Habitat in August 2000



At the Bolsa Chica mesa the vast majority of southern tarplant individuals have always been observed on the lower bench. In comparison, only about 8% of the 1993 population, 0% of the 1999 population and 11% of the 2000 population occurred on the upper bench.[33] Concentrating development on the upper bench and preserving the lower bench of the mesa is the best way of maintaining the viability of the population by protecting the greatest variety of habitats it occupies under different annual conditions and by protecting sufficient adjacent habitat for its pollinators. Under Hearthside Homes' modified plan, in 1999 about 74% of individuals would have occurred in passive recreation areas and < 1% would have occurred in a conservation area. In 2000, the respective figures would be about 44% and 2% (**Figure 4** on Page 21). The remainder in each year would have occurred in areas suggested for development (including active recreation areas). In contrast, based on existing data, concentrating development on the upper bench will protect around 90% or more of the population of southern tarplant.

[33] Individuals on the Fish and Game Reserve were not considered in these calculations.

Importance of Coyotes

The coyote, *Canis latrans*, is one of the top predators in nearly all California habitats. It has a very broad diet including fruit, insects, rodents, and smaller predators like skunks, foxes, raccoons, and feral domestic animals (so-called "mesopredators"). Recent work has demonstrated that when coyotes disappear from a habitat due to habitat loss and fragmentation, there is a concomitant decline in species diversity resulting from increased predation by mesopredators. This occurs in both upland and wetland habitats.

The diversity of upland scrub breeding birds is very sensitive to interactions between coyotes and mesopredators, particularly domestic cats, grey foxes, opossums and raccoons.[34] When coyotes are lost to the system as a result of habitat destruction and fragmentation, the numbers of mesopredators erupt and many birds are driven locally extinct. In an urban context, the major predators appear to be domestic and feral cats. Coyotes kill domestic cats which is important to control feral individuals, but more importantly their presence changes cat owners' behavior. People tend to restrict their pet's outdoor roaming when they know coyotes are present. This is very important because domestic cats are "recreational hunters" that kill beyond their nutritional needs even when prey populations are low. It is estimated [35] that, "...approximately 35 hunting, out-door cats surround a moderately sized [habitat] fragment (~20 ha) bordered by 100 residences." It was further estimated that these cats kill about 840 rodents, 525 birds, and 595 lizards each year. Maintaining the presence of coyotes in natural habitats adjacent to residential development is crucial to the preservation of avian species diversity.

At Seal Beach (or Anaheim Bay) National Wildlife Refuge (contiguous to the Naval Weapons Station) coyote visitation was interrupted in the 1970s and the numbers of non-native red foxes, striped skunks, and feral domestic cats increased, which resulted in heavy predation on lightfooted clapper rails and other species.[36] Red foxes were a particular problem because they prey on eggs and have no inhibition to hunting in the marsh. The clapper rails declined from 30 breeding pairs in 1980 to 5 pairs in 1986. Red foxes were trapped and removed (up to 300 in one summer) and 159 clapper rails were counted in 1992. Red foxes are also present at Bolsa Chica and, according to Mr. Jurek, were major predators in the 1980s. However, observations of red fox have declined markedly during the 1990s, apparently due to increased hunting pressure by

[34] Soulé, M.E., D.T. Bolger, A.C. Alberts, R. Sauvajot, J. Wright, M. Sorice, and S. Hill. 1988. Reconstructed dynamics of rapid extinction of chaparral-requiring birds in urban habitat islands. Conservation Biology 2:75-92; Crooks, K.R. and M.E. Soulé. 1999. Mesopredator release and avifaunal extinctions in a fragmented system. Nature 400:563-566

[35] Crooks and Soulé, 1999, op.cit.

[36] Zembal, R. 1993. The need for corridors between coastal wetlands and uplands in southern California. Pages 205-208 in J.E. Keeley, ed., Interface between ecology and land development in California. Los Angeles, Southern California Academy of Sciences.

coyotes.[37] The draft EIR/EIS for the lowlands restoration indicates that a radio telemetry study found that the lowlands were used by at least 16 individual coyotes and that the red fox is no longer a resident, but still occasionally visits. Coyotes are known to den in the bluff below the lower bench[38] and as many as three at a time have been observed hunting on the lower bench of the mesa.[39] The bluffs along the edge of the mesa and the bluffs separating the upper and lower bench all appear to be suitable denning habitat.

It is clearly important to maintain the presence of coyotes at Bolsa Chica, both to protect biodiversity and for management of endangered species. However, two changes will impact coyotes. Development on the mesa will remove upland habitat and restoration of saltmarsh in the lowlands will remove suitable lowland habitat. By concentrating development on the upper bench of the mesa, a large area on contiguous foraging and denning habitat on the lower bench is protected which will help ensure the continued presence of this top predator in the Bolsa Chica ecosystem.

Upland-Lowland Interactions

The maintenance of ecological links between uplands and wetlands is thought to be of extreme conservation importance. The study of such interactions is in its infancy and data remain sparse. Nevertheless, where studies have been conducted they have demonstrated that uplands and wetlands should be considered integrated parts of a larger ecosystem. The trophic linkages created by generalist predators that hunt in both uplands and lowlands have been discussed above. The importance of upland pollinators for plants like saltmarsh bird's beak and saltmarsh goldfield has also become widely recognized. As more is learned about the biology of native solitary bees, more examples will no doubt be discovered. The presence of the wetland-upland complex is also critical for many species of insects. For example, "The caterpillar of the Pygmy Blue Butterfly eat only marsh and edge species of plants belonging to the Spinach Family and the caterpillars of the Wandering skipper eat only Saltgrass. Adults of both butterflies nectar mostly on summer and fall flowering plants belong (sic) to the Sunflower Family that occur in adjacent palustrine marshes (e.g., Western Goldenrod) and shrubs of coastal sage scrub, grassland, and dune habitats including Coast Golden Bush and Mock Heather." [40] Without the appropriate mix of habitats adjacent to one another, such species will disappear from coastal ecosystems. Therefore, significant blocks of upland habitat should be maintained adjacent to coastal wetlands to provide for the species that provide functional links between those habitats

[37] Draft EIR/EIS for the Bolsa Chica Lowlands restoration project. Vol I. Prepared by Chambers Group for the California State Lands Commission, U.S. Fish and Wildlife Service, and U.S. Army Corps of Engineers, dated July 2000.

[38] Art Homrighausen (LSA), personal communication to John Dixon during a site visit on September 26, 2000.

[39] Eric Burres (CDFG), personal communication to John Dixon via email on September 5, 2000.

[40] W. Ferren, October 28, 2000, op.cit.

Comparison of Resources on the Upper and Lower Bench

Both the upper and lower bench provide foraging habitat for mammals and birds, including raptors. However, the lower bench is more distant from existing development and separated by significant vertical relief and hence is probably less subject to urban disturbance. Coyotes currently hunt throughout the mesa, but probably more frequently in areas on the lower bench buffered from existing development. Also, the bluffs associated with the lower bench provide denning habitat. Southern tarplant occurs predominantly on the lower mesa. The north, west, and south edges of the lower bench border Warner Pond, the Department of Fish and Game Reserve, and lowlands that are planned for saltmarsh restoration. Although there is a seasonal wetland present on the upper bench, it is small and degraded. Nevertheless, it appears to have supported significant numbers of southern tarplant in 2000. There are also Eucalyptus trees along the eastern edge of the upper bench that provide perching sites for raptors. However, the Eucalyptus and palm trees on the lower bench are used for perching and also for roosting and nesting by several species.

Conclusion

For all of the above reasons, the Commission therefore finds that the proposed residential development and school, because of the large size of the Bolsa Chica Mesa (approximately 224 acres), can be planned in such a manner that it minimizes impacts to the ESHA and wetland areas. Concentrating residential development on the upper bench of Mesa would achieve two beneficial objectives. First it would concentrate urban development next to an area which has already been developed. Second, it would preserve the lower bench of the Bolsa Chica Mesa which is immediately adjacent to significant habitat. The school district site can e located on the lower bench next to Warner Avenue. Placing the school site on the lower bench next to Warner Avenue minimizes adverse impacts as the future school would be less disruptive than residential units. Schools, for example, are not utilized twenty-four hours a day and have significant portions of their grounds in open space, and would not be a source of feral pets disrupting the ecosystems. Concentrating residential developments on the upper bench preserves the majority of the lower bench of the Bolsa Chica Mesa as part of the overall Bolsa Chica ecosystem which would be disrupted if fragmented by residential development.

Therefore, for all of the above reasons, the Commission finds and determines pursuant to Section 30007.5 of the Coastal Act that on balance, concentrating development on the upper bench of the mesa in close proximity to existing developed areas and conserving the lower bench of the mesa is more protective overall of significant coastal resources than protecting each specific habitat area in conjunction with development of the entire mesa.

Consistent with the findings above and the appellate courts interpretation of the application of Section 30240 of the Coastal Act the following suggested modifications will be implemented. Except for a 10 acre school site the lower bench of the Bolsa Chica

Mesa shall be designated as Conservation (**Figure 1** on Page 5) and all figures and tables of the Bolsa Chica LCP shall be modified accordingly. County Policy 3.1.2.4 (as submitted) has been modified to require that the Eucalyptus grove be preserved. New policies are 3.1.2.4 (new), 3.1.2.5 (new), 3.1.2.6 (new), and 3.1.2.11 (new). Policy 3.1.2.4 (new) requires that wetland areas outside of the wetlands ecosystem area be protected except for the seasonal pond by Los Patos. Policy 3.1.2.5 (new) contains the first part of Section 30240.

Therefore, the Commission finds for the reasons cited above that, as modified, the amended Land Use Plan is adequate to implement Sections 30233 and 30240 of the Coastal Act regarding the preservation of ESHA habitat values.

(3). Lowland Residential Development Not an Allowable Use

As submitted, the original LCP proposal was to construct up to 900 residential units in the Lowlands. The Trial Court determined that the proposed residential development in the Lowlands was not consistent with the provisions of Section 30233 and 30411 of the Coastal Act. The previous findings for denial starting on page 236 explain why residential development in the Lowlands is inconsistent with the policies of the Coastal Act.

Since the Commission acted on the Bolsa Chica LCP in January of 1996, a major change in circumstances has occurred. All of Hearthside Homes' lowland ownership, with the exception of the Edward's Thumb parcel, was bought on February 14, 1997 and is now owned by the State of California. The State Lands will be part of a future wetland restoration program governed by the Chapter 3 policies of the Coastal Act.

Regarding the Edward's Thumb parcel, the Commission has imposed the Conservation land use designation. The Conservation land use designation limits uses to those consistent with preservation of the wetland ecosystem including: restoration, creation and protection of wetlands, ESHAs, buffers; and public access for wildlife interpretation, education, and scientific study. The designation also allows development incidental to public service (including but not limited to burying cables and pipes), and on an interim basis oil production where it currently exists. The suggested modifications accomplish this and make it clear that any development rights are transferred to the Bolsa Chica Mesa and are included within the total of 1,235 residential units allowed on the Mesa.

With the suggested modifications, which eliminate the residential land use designation in the Lowlands, the Commission concludes that the Conservation land use designation is appropriate and is consistent with Section 30233 of the Coastal Act.

Additionally, elimination of the Lowland residential development and acquisition of the most of the Lowland by the State of California has created a changed circumstance resulting in the elimination of the developer sponsored wetland restoration program as

originally submitted. As a consequence, land use policies referencing the developer sponsored wetland restoration plan have been eliminated.

(4). Warner Avenue Pond Preserved, Mesa Pocket Wetlands Preserved, and Residual Lowland Wetlands Preserved

Since the Commission initially acted on the Bolsa Chica submittal in January of 1996 and based on concerns raised by the Trial Court, the Commission concludes that while it may well be possible to resolve the conflict between Sections 30233(a)(5) and 30240 of the Coastal Act, and allow the fill of Warner Pond, the preferred approach (i.e., the approach more consistent with Chapter 3 policies.) would be to avoid filling of Warner Pond.

Through suggested modifications, the LCP will be modified to reduce the number of residential units allowed on the Bolsa Chica Mesa from 2,400 homes to not more than 1,235 residential units (see land use policies 6.2.1 and 6.2.3, and regulation 2.2.1 of the Planned Community Program). This reduced residential development includes any development rights accruing from the Edwards Thumb which has been designated Conservation. The Land Use map and Zoning District map will be changed to depict high density residential (greater than 18 du/ac) development for the Bolsa Chica Mesa.

By substantially reducing the number of residential units, and with further review of traffic impacts, the Bolsa Chica LCP can be approved without the necessity of filling Warner Pond. The traffic consultants who prepared the traffic analysis for the Bolsa Chica LCP have provided further comments on this issue. In a letter dated September 9, 1997 (Attachment B), they have concluded that neither Warner Avenue nor Pacific Coast Highway, where located adjacent to Bolsa Chica, will need to be widened with a build out of 1,235 residential units on the Mesa. Their conclusion is that even when the region is built out in the year 2020, traffic volumes on Warner Avenue are projected to operate within its existing capacity so that Warner Avenue will not need to be widened. The fill of Warner Avenue Pond is necessary only if Warner Avenue is widened. If widening of Warner Avenue can be avoided, the necessity to fill Warner Avenue pond can also be avoided. Therefore, limiting residential development on the Mesa to 1,235 unitsis a less environmentally damaging alternative to the proposed density (at the time of submission) because traffic evidence documents that 1235 units will not trigger the requirement to widen Warner Avenue and consequently the fill of Warner Avenue Pond will not be necessary.

As a result, the suggested modifications require that Warner Pond and its associated wetlands be preserved and designated with the Conservation land use classification. In addition, the suggested modifications limit the total number of dwelling units on the Mesa to 1,235 units and the overall density of greater than 18 dwelling units per acre. This increased residential density includes any development rights accruing from the Edwards

Thumb which has been designated Conservation. To insure Warner Avenue will not require widening as specified in the Development Agreement, the 1,235 homes must be distributed throughout the upper bench of the Mesa in a manner that will avoid future increases in density. The homes need not all be single family homes that are evenly distributed across the upper bench of the Mesa. Some of the 1,235 units can be in the form of multifamily residential units clustered on the upper bench of the Mesa closer to Los Patos. This would be more protective of the lowland wetland values. However, overall, the 1,235 residential units must be planned to avoid creation of large undeveloped parcels that could generate requests to increase Mesa density in the future (see Land Use Policies 6.2.1 and 6.2.3, and Regulation 2.2.1 of the Planned Community Program).

To assure that the adverse impacts of wetlands are mitigated as required by the marine protection policies of the Coastal Act, the Commission has added several new Land Use Plan policies and revised several existing land use policies. First, Policy 3.1.2.1 has been revised to delete references to Lowland residential development and to specify that the Wetlands Ecosystem is comprised of Planning Areas 1A, 1B, and 1D and that all lands in the Wetlands Ecosystem shall be designated as Conservation on the Development Map of the Bolsa Chica Planned Community Program. Policies 3.1.2.2 and 3.1.2.3 (as submitted) have been deleted since the Wetland Restoration Program is no longer part of this Local Coastal Program. The Commission is adding to the "*Environmentally Sensitive Habitat Area (ESHAS) Policies*" the requirements of Sections 30233 and 30240, of the Coastal Act. Adding the requirements of Sections 30233 and 30240 clarifies the allowable use of wetland and ESHA areas. County Policies 3.1.2.4 and 3.1.2.5 (as submitted) have been modified to protect the Eucalyptus grove, Warner Avenue Pond, the Mesa Pocket wetlands, and the residual lowland wetlands. Additional policies deleted due to the elimination of Lowland residential development and the Wetland Restoration Program include policies 3.1.2.7 through 3.1.2.12 (as submitted).

Only as modified to protect Warner Avenue Pond, the Eucalyptus grove, the wetland #2 (**Figure 1** on Page 5), and the residual lowland wetlands is the Resource Restoration and Conservation Components chapter of the amended Land Use Plan consistent with the applicable Chapter 3 policies of the Coastal Act.

2. COASTAL/MARINE RESOURCES POLICIES

a. DENIAL OF THE LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan

The 1986 Land Use Plan proposed to create 915 acres of fully functioning wetlands that would be connected to the Pacific Ocean. To connect the wetlands to the ocean, the

Land Use Plan called for the creation of either a navigable ocean entrance near the intersection of Warner Avenue and Pacific Coast Highway or a non-navigable ocean entrance. Additionally, there would be interior navigable waterways providing navigation connections to the marina, waterfront residential housing, and Huntington Harbour.

The non-navigable ocean entrance would have allowed ocean access for boats through Huntington Harbour. The navigable ocean entrance would have been 900 feet wide. The decision on which alternative ocean entrance would be implemented was to be made following completion of a study and other actions concerning whether the navigable ocean entrance was the least environmentally damaging alternative. None of the identified actions necessary make this determination were completed.

(2). Land Use Plan Amendment

The amendment to the Land Use Plan, as submitted in June 1995, proposed to create a wetland ecosystem of 1,100 acres within the LCP area. To connect the wetlands to the ocean, the Land Use Plan amendment calls for the creation of a non-navigable ocean entrance. The ocean channel is estimated to be 250 feet wide and would be graded to -5 feet mean sea level. The entire width of the ocean inlet, including the jetties, is estimated to be 420 feet. The non-navigable ocean entrance would be located at the south end of Bolsa Chica.

To improve fresh water flows into the wetlands and to provide up-stream flood control, the East Garden Grove Wintersburg (EGGW) Channel would be upgraded to handle a 100 year flood event and would be relocated so that it would empty into the full tidal wetlands.

(3). Applicable Coastal Act Policies

Applicable Coastal Act policies for analyzing the conformance of the amended Land Use Plan are Section 30230, Section 30231, Section 30232, and Section 30235. These policies pertain to the protection of marine resources. Section 30230 calls for the protection and enhancement of marine resources. Section 30231 calls for protecting and enhancing biological productivity of coastal waters and the protection of human health. Section 30232 calls for the protection against the spillage of petroleum products, and Section 30235 allows jetties only for coastal dependent uses when designed to eliminate or mitigate adverse impact on local shoreline sand supply.

(4). Coastal Act Consistency

The Coastal Act mandates that coastal and marine resources shall be maintained, enhanced, and where feasible restored to protect biological productivity and water quality, through the control of runoff and other means. These Coastal Act policies mandate that proposed allowable development be designed to minimize adverse impacts to coastal processes. The Land Use Plan amendment as submitted lacks policies which fully implement these mandates. The policies contained in the Coastal/Marine Resources Section of the Land Use Plan amendment contain project specific policies concerning the tidal inlet and hydrology. Broad policies which call for the maintenance and enhancement of coastal and marine resources and the protection of human health are lacking.

Without policies similar to Sections 30230, 30231, 30232, and 30235 the Land Use Plan amendment would not be in conformance nor adequate to carry out these sections of the Coastal Act. For example, this section of the Land Use Plan amendment does not contain policies which specifically call for the protection and enhancement of biological

productivity, enhancement of coastal water quality, nor the protection of human health. The necessity of the Land Use Plan amendment to incorporate these policies arises from the need to protect coastal waters from the adverse effects of urban run-off and the potential of the adverse effect on water quality should there be an oil spill resulting from the continued production of petroleum products.

Bolsa Chica is a known oil producing area; but, as submitted, there is no policy which mandates the protection against the spillage of petroleum products in the Resource Restoration and Conservation Component. Additionally, should a spill occur, effective containment and cleanup must be provided to assure that potential environmental damage is minimized and mitigated. As an oil producing area there is always the potential for an oil spill.

The spillage of a hazardous substance into the wetlands or into tidal waters would have a significant adverse impact on water quality and the affected biological resources. Certain restoration activities such as grading would increase the potential for a spill by accidentally dislodging old pipes. Consequently, policies must exist in the Land Use Plan amendment to prevent, contain, and mitigate petroleum spills. The Wetlands Restoration Program, as submitted, did contain regulations which address this issue. However, the umbrella Land Use Plan policy which justifies the presence of these regulations in the Wetlands Restoration program is lacking. Even though the Wetland Restoration Program, as submitted, has been deleted from the Bolsa Chica LCP due to the purchase of the lowland by the State, the lack of land use policies mandating that the coastal resources be protected from oil spills is still a major deficiency.

While the initial submittal of the County of Orange for the Bolsa Chica LCP Land Use Plan Amendment No. 1-95 contained many specific policies with regards to wetlands restoration, particularly as it applies to flood control issues associated with the East Garden Grove Wintersburg (EGGW) Channel and a proposed new 250 foot wide ocean inlet, the acquisition of the Lowlands by the State results in changed circumstances as to the ultimate wetland restoration proposal which will be developed and implemented. Such policies regarding the EGGW Channel are no longer appropriate in the LCP and issues associated with flood control will need to be addressed in the future lowland wetlands restoration program which is currently in the early stages of development. As to any ocean inlet, again, that issue will depend on the final lowland restoration program which will need to be submitted for review and approval by the Commission. Accordingly, these policies have also been deleted.
In conclusion, the Commission finds that, as submitted, the Bolsa Chica LCP does not include policies similar to the language found in Sections 30230, 30231, 30232, and 30235. Finally, the policies of the LCP regarding the EGGW Channel and any new ocean inlet need to be deleted as the flood control and ocean inlet issues must be dealt with in the overall context of the future lowland wetlands restoration program. For all these reasons, the Commission finds that, as submitted, the Land Use Plan amendment

is not in conformance with the coastal and marine policies of the Coastal Act regarding water quality, biological productivity, and human health.

b. APPROVAL AS MODIFIED

Several of the proposed policies have been modified to bring this section of the Land Use Plan amendment, as submitted, into conformance with the Coastal Act. Since general policies regarding the maintenance and enhancement of marine resources were lacking in the submittal, Sections 30230 and 30231 of the Coastal Act have been incorporated into the Coastal/Marine Resources Policies Section. Section 30230 has been incorporated as new County Policy 3.2.2.1 (new). Section 30231 has been incorporated as new County Policy 3.2.2.2. (new)

Similarly, Section 30235 of the Coastal Act has been incorporated into the Coastal/Marine Policies Section as new County Policy 3.2.2.3 (new) since this section lacked polices which would minimize the adverse impact of a proposed development on coastal processes.

Bolsa Chica is an oil producing area. The Land Use Plan amendment, as submitted, did not contain a policy in the Coastal/Marine Resources Policies section that mandate the protection against the spillage of hydrocarbon products. Section 30232 of the Coastal Act has been incorporated as new County Policy 3.2.2.12 (new) of the Coastal/Marine Policies section to assure that the marine resources within Bolsa Chica are protected from the spillage of hydrocarbon products.

Additionally, policies have been modified to strengthen the intent of minimizing adverse impacts to coastal and marine resources. These policies have been modified to more fully address potential water quality related impacts associated with the proposed residential development on the Mesa, which will result in the modification of the natural drainage system, creation of impervious surfaces, and increase of pollutant loads and runoff volume from the Mesa, in a manner consistent with Coastal Act policies, in consideration of recent information and research concerning the nature and significance of urban runoff impacts on water quality, as more fully described below.

Development within the Bolsa Chica LCP Area has the potential to cause or contribute to adverse impacts on surface water quality which can thereby, impact wildlife habitat, public health and recreational access to receiving waters. Stormwater and non-stormwater runoff from development can cause or contribute to adverse impacts on water quality during project construction, and in the post-development stage. Impacts associated with construction activity include erosion, resulting from exposed and un-stabilized slopes and sedimentation of coastal waters during grading, resulting from uncontrolled runoff. Post-construction phase impacts are the result of the creation of impervious surface, which in effect, decreases the infiltration function and capacity of

permeable land. As a result, runoff volume and velocity are expected to increase. Further, pollutants commonly found in urban runoff include, petroleum hydrocarbons including oil and grease from vehicles; heavy metals; synthetic organic chemicals including paints and household cleaners; soap and dirt form washing vehicles; dirt and vegetation from yard maintenance; litter; fertilizers, herbicides, and pesticides; and bacteria and pathogens from animal waste. The discharge of these pollutants to coastal waters can cause: eutrophication and anoxic conditions resulting in fish kills and diseases and the alteration of aquatic habitat, including adverse changes to species composition and size; excess nutrients causing algae blooms and sedimentation increasing turbidity which both reduce the penetration of sunlight needed by aquatic vegetation which provide food and cover for aquatic species; disruptions to the reproductive cycle of aquatic species; and acute and sublethal toxicity in marine organisms leading to adverse changes in reproduction and feeding behavior. These impacts reduce the biological productivity and the quality of coastal waters, streams, wetlands, estuaries, and lakes and reduce optimum populations of marine organisms and have adverse impacts on human health, which can in turn severely limit public recreational access and opportunities.

To ensure that the design of urban development on the Mesa, and management of stormwater and nuisance runoff associated with the development, is consistent with the water and marine resource policies of the Coastal Act, specific policies have been added as discussed above. In addition existing policies addressing requirements associated with the preparation of a Water Quality Management Plan for development on the mesa have been supplemented to specifically highlight development standards and management measures to be applied to development in order to prevent minimize and where necessary mitigate urban runoff impacts on coastal resources. In addition, the Commission is imposing requirements, which are reflected in policy modification, that any Water Quality Management Plan which is prepared, include a monitoring program to assure that potential sources of adverse impacts to water quality, resulting from development are detected and corrected, to provide an educational program to inform the public about the importance of water quality, to require the use of Best Management Practices (BMPs) effective at mitigating pollutants of concern during all phases of development, and a long-term maintenance program for approved best management practices.

Though the imposition of best management practices can minimize the impact of urban development on water quality the Commission recognizes that some significant impacts can still occur as a result of he introduction of concentrated freshwater to discharge directly into Outer Bolsa Bay, or other sensitive wetlands and/or habitat areas. As previously discussed, the State Ecological Reserve is considered an ESHA. Outer Bolsa Bay, Warner Pond and the Lowland Restoration Area are also ESHAs. The plant and animal life in these ESHAs is adapted to a marine environment. Any proposed storm drain system will change the natural drainage system by rapidly collecting fresh water runoff and immediately discharging it into receiving waters. The rapid discharge of

undiluted fresh water into an ecosystem adapted to salt water can have a toxic effect on the plant and animal life dependent on ocean water. Further, consistent with Section 30240 of the Coastal Act, the construction of storm drain outlets into an ESHAis not a use dependent on the resource. Therefore, the Commission finds that the placement of storm drains is inconsistent with the Coastal Act and that the LCP must be modified by revising Policy 3.2.2.4 (as submitted) to prohibit the direct discharge of fresh water through storm drains into Outer Bolsa Bay, the Ecological Reserve, Warner Pond or the lowland wetlands restoration area. This prohibition on storm drains is also supported by the fact that the storm drains would visually degrade the naturalness of Outer Bolsa Bay inconsistent with Section 30251 of the Coastal Act and would be publicly visible from Pacific Coast Highway and the interpretive center. Therefore, policies have been added and/or modified where necessary to prohibit the direct discharge of stormwater into Warner Pond, Outer Bolsa Bay, the Ecological Reserve, and the lowland wetland restoration areas.

With regard to the issue of nuisance flows, nuisance flows are flows that occur during dry-weather. They are generated from over-watering, car washing activity and other sources. These flows are not a natural occurrence; rather they are the result of activity and operations associated with urban development. In this case the landowner / master developer has submitted information to the Commission concerning their intent to divert nuisance flow to a treatment plant, as one option which would serve to address potential impacts associated with nuisance flow on coastal and marine resources.

The Commission finds that in addition to the other source and treatment control measures required by the LCP, as conditions of development, dry-weather nuisance flow diversion will serve to eliminate the potential for nuisance flow runoff to cause or contribute to adverse impacts on coastal and marine resources, where such flow can alter natural dry-weather conditions, and/or contribute to the conveyance of pollutants to coastal waters which can have adverse impacts on public access to beaches and other waterways during dry-weather, which is the high-use season.

Therefore the Commission finds that in this case, in addition to the BMPs required to control and mitigate stormwater runoff from development on the Mesa, a modification which adds a specific requirement for the construction and operation of a dry-weather diversion, as an implementation measure which will be a condition of approval for development pursuant to the specifications of the LCP, reflects the intent of the landowner/master developer's proposal, and is consistent with the water quality policies of the Coastal Act, and the LUP as amendment as certified.

Thus only as modified, and supplemented for the use of best management practices, a prohibition on storm drains discharging directly into Outer Bolsa Bay, and other sensitive wetlands, and other provisions as cited above does the Commission find the water,

coastal and marine policies governing the proposed development of the Mesa consistent with the Coastal Act.

The Commission finds that it is inappropriate to include policies regarding the EGGW channel in the LCP since the State has bought the Lowlands and is in the process of preparing a wetlands restoration program which will include provisions regarding flood control. At this time there is a divergence of opinion on the best means to deal with flood control. For that reason, the Commission finds that the policies in the Land Use Plan regarding the EGGW Channel should be deleted.

Finally, the suggested modifications include adding policies similar to the language found in Sections 30230, 30231, 30232, and 30235. With these modifications, the Land Use Plan amendment is found by the Commission to conform with the Coastal Act regarding water quality, biological productivity, and human health.

3. PHYSICAL RESOURCES POLICIES

a. DENIAL OF THE LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan

The Land Use Plan submitted in 1986 proposed a variety mitigation measures to address a range of geotechnical concerns. Proposed mitigation measures included the requirement for site specific engineering studies prior to subdivision approval, that geotechnical studies be prepared for development near the Newport-Inglewood fault, and the requirement that development be set back a distance sufficient to protect a structure from the threat of erosion for a period of fifty years.

(2). Land Use Plan Amendment

The amendment to the Land Use Plan, as submitted, also proposes mitigation measures to address a range of geotechnical concerns. These mitigation measures include the grading of slopes that are believed to be unstable, the requirement that areas subject to liquefaction improve the resistance of soils to liquefaction, that development near the Newport-Inglewood fault be in conformance with engineering guidelines, and the requirement that development be set back a distance sufficient to protect the structure from the threat of erosion for a period of fifty years. The amended Land Use requires that graded slopes be recontoured and landscaped to restore the natural landform appearance.

(3). Applicable Coastal Act Policies

The applicable Coastal Act policy for analyzing the conformance of the amended Land Use Plan is Section 30253. Section 30253 requires that new development shall minimize risks to life and property. Further, new development shall be designed in a manner that would not contribute to geologic hazards nor require the presence of protective devices.

(4). Coastal Act Consistency

The Coastal Act mandates that development be carried out in manner which minimizes the impact of the development on natural land forms. Additionally, development which is allowed to occur in hazardous areas should designed to minimize the risk to life and property. Bolsa Chica, is subject to a variety of potentially hazardous events. The Newport-Inglewood fault crosses the entire site. Development located on the Mesa is susceptible to bluff failure. Additional hazards in the Lowland areas include flooding, liquefaction, and subsidence. As an oil producing region, toxic hazards include submarine hydrocarbon seepage, subterranean gas accumulation, and corrosive soils. The land use plan amendment, as submitted, contains policies which do not fully adhere to the Coastal Act polices for minimizing the risk to life and property. Specifically, the Local Coastal Program would allow new development to be placed close to the bluff edge, and would allow alteration of the bluff face.

Allowing excessive bluff face alteration and inappropriate bluff setbacks, also creates inconsistency with the access and scenic resource sections of the Coastal Act. Sections 30211, 30212, 30212.5, and 30213 of the Coastal Act mandate that new development not interfere with existing access to the coast, that new development provide access to the coast, and that lower cost visitor serving recreational opportunities be provided. The proposed setback (as submitted) would be inadequate in terms of providing sufficient open space to promote public use of the buffer areas between the wetland and the residential development. This analysis is more fully described in the findings for the Public Access/Visitor Serving Recreation Component.

Section 30251 of the Coastal Act states that scenic and visual qualities shall be protected and that landform alternation be minimized. The LCP as submitted would allow extensive grading (an estimated 1,500,000 cubic yards of cut and 1,500,000 cubic cards of fill), bluff face alteration, and the placement of residential units close to the bluff face. All these project elements taken together would change the appearance of the Bolsa Chica Mesa from open space to urban residential development. Additionally, the proposed development is not consistent with Section 30253 since locating development close to a bluff edge does not minimize risk, but actually creates risk that the structures may be affected by slope failure.

Therefore, the Commission, for the reasons cited above, finds that the Land Use Plan amendment (as submitted) is not in conformance with, nor adequate to carry out the

development policies of the Coastal Act concerning development in potentially hazardous areas.

b. APPROVAL AS MODIFIED

Section 3.3.2 of the amended Land Use Plan, as submitted, contains the policies for minimizing hazards to life and property. Most of the policies in this section comply with Section 30253. Policies exist to minimize the proposed development's risk exposure by requiring that subsidence will be monitored, that geotechnical reports be prepared to determine structural setbacks, and that degraded slopes be remedially graded. Additionally the EIR for Bolsa Chica contained project design features to minimize geotechnical hazards. These project design features included dynamic deep compaction to minimize liquefaction, the construction of a cutoff wall to reduce the potential for water intrusion, the requirement that lowland residential construction could not be initiated until the lowland is removed from the Santa Ana River floodplain, and the preparation of remediation plans to remove toxic substances that are encountered. However, several policies must be modified to bring this section into conformance with Section 30253 of the Coastal Act.

To bring this section of the land use plan amendment, as submitted, into conformance with Section 30253 of the Coastal Act; six policies have been modified. County Policy 3.3.2.1 and County Policy 3.3.2.2 (as submitted) have been modified through minor wording changes to clarify that one appropriate mitigation strategy in areas of high geologic hazard is through foundation design and development comply with real estate disclosure requirements.

The avoidance of geological hazards through increased setbacks is a preferred and feasible option for minimizing the potential that a bluff failure would adversely impact the residential development. Furthermore, the Commission found in the Wetlands/Biological Resource Policies section that residential development be limited to the upper bench of the Bolsa Chica Mesa, that a fifty foot buffer be provided inland of where the upper bench begins, that a setback of one-hundred feet inland from either the Eucalyptus grove ESHA, or the edge of the Bolsa Chica Mesa bluff facing outer Bolsa Bay (whichever is the greater distance). Limiting residential development to the upper bench of the Bolsa Chica Mesa and the imposition of the buffers also removes the potential of residential development within planning area 9 (Figure 2.1-1 of the submitted LCP) occurring within the Santa Ana River floodplain.

As submitted, neither County Policy 3.3.2.5 nor County Policy 3.3.2.10 are consistent with Section 30253 and the Commission's decision mandating that the proposed development be setback through the creation of a buffer area. Furthermore, County Policy 3.3.2.10 (as submitted) would not be consistent with Section 30235 of the Coastal Act since it would allow the placement of a shoreline protective device for the benefit of

proposed residential development. Consistent with minimizing risk, minimizing landform alterations, and preserving resource values within the buffer Policies 3.3.2.5 and 3.3.2.10 (as submitted) have been modified to require that residential development on the upper bench of the Bolsa Chica Mesa be setback. This setback will be the greater of: 100 feet from the blufftop edge, 100 feet from a wetland or ESHA, or a distance sufficient to protect the structure from erosion for a period of fifty years. Though, the Bolsa Chica Mesa residential development would still be subject to hazards such as earthquakes, bluff failure, and erosion, the benefit of the increased private residential setback would be increased safety for the homeowners. Policy 3.3.2.10 (as submitted) has also been modified to state that development be sited and designed to minimize the alteration of natural landforms. Through these suggested modifications risks to property and life would be minimized and the amended Land Use Plan could be found consistent with Section 30253 of the Coastal Act as most of the risks to life and property would be resolved.

Suggested modifications affecting specifically the Huntington Mesa include County Policies 3.3.2.7 (as submitted) and 3.3.2.9 (as submitted) for Harriett Wieder Regional Park. County Policy 3.3.2.7 (as submitted) calls for the preservation and restoration of the northeast facing bluff below the Huntington Mesa and has been modified to assure consistency with LCP's Public Access and Visitor Serving Component. County Policy 3.3.2.9 (as submitted) adds additional criteria for implementing the buffer policies.

Therefore, as modified, the Commission finds that the Land Use Plan amendment is in conformance with and adequate to carry out the development policies of Section 30253 the Coastal Act regarding hazardous areas and minimizing the risk to life and property.

4. CULTURAL RESOURCES POLICIES

a. DENIAL OF THE LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan

The 1986 Land Use Plan required that cultural and paleontological resources be protected either in place or through recovery, identification, and analysis of such resources so that their scientific and historical values are preserved. Additionally the Land Use Plan required that appropriate mitigation measures be developed for archeological site ORA-83. County certified Archeologists and Paleontologists were required to monitor all grading operations to insure that any significant resources would not be destroyed.

(2). Land Use Plan Amendment

The amended Land Use Plan, as submitted, requires that cultural and paleontological resources will be protected either in place or through recovery, identification, and analysis of such resources so that their scientific and historical values are preserved. Additionally the recommendations of the Most Likely Descendants, as designated by the California native American Heritage Commission, will be obtained prior to the reburial of any prehistoric Native American human remains that may be encountered during any archeological investigation. County certified Archeologists and Paleontologists will monitor all grading operations to insure that significant resources will not be destroyed.

(3). Applicable Coastal Act Policies

The applicable Coastal Act policy for analyzing the conformance of the amended Land Use Plan is Section 30244. Section 30244 requires that when new development would adversely impact archaeological or paleontological resources that mitigation will be provided.

(4). Coastal Act Consistency

The Coastal Act mandates that reasonable mitigation measures shall be required when development would adversely impact archaeological and paleontological resources as identified by the State Historic Preservation Officer. The cultural resource policies contained in the land use plan amendment as submitted do not fully comply with this mandate. Section 3.4.2 of the amended Land Use Plan recognizes that cultural resources are to be protected. County Policy 3.4.2.3, as submitted, requires that the archeological research design be completed prior to the approval of the first coastal development permit authorizing construction. The submission of an archeological research design immediately prior to the initiation of construction is too late for assuring that adequate mitigation for archeological resources have been provided. To be effective the archeological research design must be completed at the design phase of proposed construction, which is at the Coastal Development Permit stage. At the design stage, mitigation can be incorporated into proposed development to address problems which would not be the case when construction is about to begin. Having the research study completed prior to issuance of the Master Coastal Development Permit will allow the proposed development to be effectively designed based on a completed cultural resource study.

Section 3.4.2 of the amended Land Use Plan recognizes that paleontological resources are to be protected. County Policy 3.4.2.5 as proposed only protects those paleontological resources deemed significant by a County certified paleontological field observer. Because the significance of all paleontological resources cannot always be immediately ascertained, all paleontological resources must be preserved until they can be evaluated. If not properly located and designed development could significantly

adversely impact archeological and paleontological resources. Excavation commonly performed as part of the site preparation process can easily obliterate archeological and paleontological artifacts. Archeological artifacts have great cultural and religious significance. Paleontological artifacts can posses scientific importance.

To protect archeological and paleontological resources Section 30244 of the Coastal Act requires that when development would adversely impact these resources, reasonable mitigation measures shall be required. Delaying the adverse impact of development until a determination can be made on how to effectively preserve an archeological or paleontological artifact is to be preserved is a reasonable mitigation measure. Therefore, the Commission finds that, as submitted, the land use plan amendment is not in conformance with and not adequate to carry out the policies of the Coastal Act concerning the protection of cultural and paleontological resources.

b. APPROVAL AS MODIFIED

To bring this section of the Land Use Plan Amendment, as submitted, into conformance with Section 30244 of the Coastal Act, County Policies 3.4.2.2, 3.4.2.3, 3.4.2.4 and 3.4.2.5 (as submitted) have been modified. County Policy 3.4.2.3 has been strengthened by requiring that the results of archeological research design be submitted as part of the application for a Coastal Development Permit that affects an area with cultural resources. Finally, County Policy 3.4.2.4 has been modified to delete references to the Lowland since residential development is no longer proposed in the Lowland and the Lowland has been acquired by the State. As modified, this policy will require that a systematic cultural resources survey will be conducted within the Bolsa Chica LCP area and if a site is found to be significant, the site will be preserved in open space if feasible.

These suggested modifications protect archeological resources by requiring that the research be completed before development plans are approved. Thus, a project that could adversely impact cultural resources will be conditioned or redesigned at the design stage to mitigate adverse impacts. County Policy 3.4.2.5 has been modified to require that a determination of significance for a paleontological artifact be made prior to allowing it to be disturbed, and if found to be significant that a recovery plan be completed before construction is allowed to continue. Therefore, as modified, the Commission finds that the land use plan amendment is in conformance with and adequate to carry out Section 30244 the Coastal Act regarding cultural and paleontological resource policies.

5. VISUAL AND SCENIC RESOURCES POLICIES

a. DENIAL OF THE LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan

The 1986 Land Use Plan proposed to create new viewing opportunities through public perimeter trails and a series of scenic public overlooks. The construction of a realigned Pacific Coast Highway, 75 acre marina/commercial complex, bridges, cross gap corridor road, and the excavation of a Huntington Harbour connection channel would have created a significant alteration to landforms and the visual character of the area. Additionally, high density residential development on the Mesa and low density residential development in the Lowland would have changed the character of the area from open space to urban. The visual impact of marina, commercial, and residential development would have been softened through landscaping.

(2). Land Use Plan Amendment

The Land Use Plan amendment, as submitted, proposes to enhances visual and scenic resources of Bolsa Chica through wetlands restoration, the removal of existing industrial development, and the creation of new public viewing opportunities. The visual impacts of new urban development will be mitigated through a variety of techniques such as grading, landscaping, and development setbacks. New viewing opportunities would be provided by public perimeter trails and a series of scenic public overlooks. The proposed public access and recreation plan is contained in Figure 4.3-2 of the Land Use Plan. The public currently has only limited access to the two Fish and Game overlooks and the immediate area around Outer Bolsa Bay and Inner Bolsa Bay. Following implementation of the public access and recreation program, public access will be provided along the perimeter of the Bolsa Chica Lowlands including the south blufftop of Bolsa Chica Mesa.

The proposed jetties associated with the tidal inlet would have a mixed effect on visual resources. On the positive side the jetties would provide an elevated platform out in the ocean on which the public will have long range views up and down the beach. A negative impact is that the jetties would interrupt sand-level views along the length of the beach. The construction of 3,300 homes on the Mesa and the Lowland would change the character of the area from open space to urban development. The visual impact of residential development would be softened through landscaping.

(3). Applicable Coastal Act Policies

The applicable Coastal Act policy for analyzing the conformance of the amended Land Use Plan is Section 30251. Section 30251 requires that scenic and visual qualities of coastal areas shall be considered and protected as a resource of public importance.

(4). Coastal Act Consistency

Section 30251 of Coastal Act mandates that the scenic and visual qualities of coastal areas be considered and protected as a resource of public importance. Additionally, development should be sited and designed to protect views to and along the ocean. The new residential development will detract from the site's current use as open space. As submitted, the adverse visual impacts of the residential development will be mitigated through landscaping and development setbacks.

Though, the LCP as submitted proposes to mitigate the adverse visual impacts through landscaping and development setbacks, the Commission has found that residential development in the lowlands and on the lower bench of the Bolsa Chica Mesa is inconsistent with the resource protection policies of the Coastal Act as discussed in findings for the "Development Component" starting on page 298. The Commission through suggested modifications in the Development Component has limited development to the upper mesa, established buffer criteria, and limited development to a maximum of 1,235 residential units.

This reduction in the number of residential units would have a beneficial impact on visual and scenic resources. First, the entire lower bench of the Mesa would be preserved as natural open space. The lower bench is highly visible from Pacific Coast Highway (a major coastal highway) and the elimination of the residential development from the lower bench would preserve public open space views from Pacific Coast Highway. Second, Warner Pond and wetland #2 (**Figure 1** on Page 5) would be preserved as open space. Third, the establishment of a 100 foot buffer inland from the Eucalyptus grove or the bluff edge overlooking the lowland would reduce visual impacts by setting back the residential development.

Though residential development in the lowlands and on the lower bench has been eliminated, the visual and scenic resource policies (as submitted) still do not fully implement Section 30251 of the Coastal Act. Specifically missing are the policy requirements that the scenic and visual qualities of coastal areas shall be considered and protected as a resource of public importance. Also missing is the requirement that development be sited to protect public views of the ocean, to minimize the alteration of natural land forms, and that development be compatible with the character of surrounding areas.

Consequently, the Bolsa Chica Local Coastal Program, as submitted, would allow development not in conformance with Section 30251 of the Coastal Act since the Visual and Scenic Resources Component does not contain similar policies. Conflicts with Section 30251 of the Coastal Act in term of blufftop setbacks were analyzed in the preceding section (Physical Resources Component). This analysis pointed out that development near bluff top edges would eliminate the natural appearance of the slope. Additionally placing development near bluff tops is not consistent with the concept of

visual compatibility and that new development in scenic areas should be subordinate to the character of its setting.

Therefore for the reasons discussed above the Commission finds that (as submitted) the Land Use Plan Amendment is not in conformance with nor adequate to carry out Section 30251 of the Coastal Act concerning minimizing land form alterations and protecting visual and scenic resources.

b. APPROVAL AS MODIFIED

To bring this section of the Land Use Plan Amendment, as submitted, into conformance with Section 30251 of the Coastal Act County Policies 3.5.2.1, 3.5.2.4, 3.5.2.6, 3.5.2.7, 3.5.2.8, 3.5.2.9, 3.5.2.10, 3.5.2.11, 3.5.2.14, and 3.5.2.17 (as submitted) have been modified. County Policies 3.5.2.2, 3.5.2.3, 3.5.2.13, 3.5.2.18, and 3.5.2.19 (as submitted) have been deleted.

County Policies 3.5.2.2 and 3.5.2.3 (as submitted) have been deleted. The developer sponsored wetland restoration program, as submitted, has been deleted from the LCP since the majority of the Lowland has been acquired by the State of California and a new wetland restoration program is under development. Therefore, these policies are no longer applicable. County Policy 3.5.2.19 (as submitted) is being deleted since Lowland residential development is no longer being proposed as the Lowland area has been acquired by the State for purposes of wetland preservation.

County Policy 3.5.2.18 (as submitted) has been deleted. This policy has been deleted since it would now be a redundant policy. County Policy 3.5.2.17 has been modified to state that building heights shall be limited to two stories. As originally submitted, Policy 3.5.2.17 applied to residential development on the lower bench of the Mesa.

County Policy 3.5.2.1 (as submitted) is being modified to incorporate the language of Section 30251 of the Coastal Act. As submitted, the specific visual and scenic resource policies focus on specific issues and do not address the broad policy mandates of Section 30251. Incorporation of Section 30251 will provide the general policy direction to be followed in situations not covered by the policies as submitted.

County Policy 3.5.2.4 (as submitted) has been modified to assure that public viewing opportunities will be provided from all trails and to delete Class 1 bike trails in the Lowlands. County Policies 3.5.2.7 and 3.5.2.8 (as submitted) have been modified to include the California Department of Fish and Game. The California Department of Fish and Game is the agency responsible for the management of the Sate Ecological Reserve and they should be included in any management decisions regarding the Ecological Reserve.

County Policy 3.5.2.9 (as submitted) has been modified to include native drought tolerant vegetation. County Policy 3.5.2.13 (as submitted) has been deleted pending the development of a new park master plan for Harriet Wieder Regional Park. Finally, Policy 3.5.2.14 (as submitted) has been modified to incorporate a requirement to provide visually compatible signage to direct the public to public recreational facilities.

County Policies 3.5.2.10 and 3.5.2.11 (as submitted) have been revised to clarify that plant material within the residential development setback area (buffer) provide visual screening to soften the transition from the Wetlands Ecosystem to the residential development.

Therefore, as modified, the Commission finds that the land use plan amendment is in conformance with and adequate to carry out Section 30251 of the Coastal Act regarding visual and scenic resources.

B. PUBLIC ACCESS/VISITOR SERVING RECREATION COMPONENT
CHAPTER 4 OF THE LAND USE PLAN AMENDMENT

a. DENIAL OF THE LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan - Public Access/Visitor-Serving Amenities

One of the primary components of the 1986 LUP was the 60 acre marina/15 acre visitor-serving commercial complex located both in the Lowlands and on the south and southwesterly portion of the Bolsa Chica Mesa. The marina/commercial facility included a 1,300-slip marina, dry storage for at least 400 boats, public launch ramps, a 150 room motel, 85,000 sq. ft. of specialty retail (including 3 restaurants), four additional freestanding restaurants, and passive recreation area as well as an option for neighborhood commercial services adjacent to proposed housing. Trails linked the proposed marina/visitor-serving commercial and wetlands areas to the proposed Bolsa Chica Regional Park on the Huntington Mesa and the Bolsa Chica State Beach.

(2). Land Use Plan Amendment

The Land Use Plan amendment, as submitted, eliminates the marina and associated boat storage and support uses as well as the previous 75 acre marina/commercial development which included 15 acres of visitor-serving retail, restaurant and overnight lodging uses on the Bolsa Chica Mesa and Lowlands. The current LUP provides no visitor-serving commercial uses. It allows the optional provision of up to 10 acres of neighborhood commercial use on the Bolsa Chica mesa. The actual land use designation of the optional neighborhood commercial area is “medium density residential”.

However, the public access and recreation amenities of the LUP amendment as submitted include an active and passive park on the Bolsa Chica Mesa; an active and passive park in the proposed Lowland residential area; the development of Harriett Wieder Regional Park on the Huntington Mesa (approximately 58 acres within the LCP area); and a 4-acre kayak/canoe/beach facility within the Conservation Planning Area on the inland side of Pacific Coast Highway, opposite the proposed tidal inlet. Equestrian and hiking trails are planned for the regional park and Class I and Class II bicycle trails and pedestrian trails are proposed on both mesas and within the Lowland wetlands restoration area. Interpretive trails with controlled public access are proposed within the Wetlands Restoration Area and the existing 306-acre State Ecological Reserve.

(3). Applicable Coastal Act Policies

The Chapter 3 Coastal Act policies which mandate public access and public recreation provisions include 30210, 30211, 30212, 30212.5, 30213, 30214, 30220, 30221, 30222 and 30223. In summary, the public access policies require the provision of maximum public access to the ocean in new development whenever appropriate and feasible, and prohibits new development from interfering with existing public access. Additionally, Chapter 3 policies encourage lower cost visitor recreation facilities.

(4). Coastal Act Consistency

Chapter 4 of the Land Use Plan Amendment, as submitted, discusses the proposed public access and visitor serving recreation plans. This plan proposes new trails, parks, and open space which will complement and tie together the existing regional facilitates, including Bolsa Chica State Beach, the State Ecological Reserve, and Huntington Central Park. The introductory section states that the Plan "*maximizes public access and public recreation/visitor-serving opportunities while respecting the environmentally sensitive Bolsa Chica wetlands*". It further states that the "*plan showcases the unique coastal resources at Bolsa Chica while protecting the wetlands and ESHAs from inappropriate uses*."

The LUP amendment as submitted proposes various recreational amenities, as described above, which afford the opportunity for public enjoyment and access to the coast and the coastal resources of the LCP area. The Bolsa Chica mesa active and passive parks, Lowland active park, Lowland pedestrian trails providing public access to the coastal wetlands and offering wetland viewing opportunities, and pedestrian and bicycle trails linking the Bolsa Chica Mesa to the Harriett Wieder Regional Park on the Huntington Mesa meet the Coastal Act requirement in terms of the amount of lower cost recreational uses being provided and made available to the public. Further, the Coastal Act requirement of assuring that the recreational needs of the new residents not overload the nearby coastal recreation areas is accomplished through the provision of the two active parks adjacent to the residential areas.

However, as submitted, the amended LUP is not consistent with the public access, public recreation and marine and land resources protection policies of the Coastal Act in that public access to the State Ecological Reserve trails is proposed to be restricted; the Harriet Wieder Regional Park development plan does not provide adequate public parking and does not protect wetlands and other environmentally sensitive vegetation; and the proposed kayak/canoe facility raises concerns over public health and safety. Therefore the Commission denies the amended LUP as submitted.

<u>Bolsa Chica State Ecological Reserve Trails</u>

The Bolsa Chica LCP area includes the 306 acre Bolsa Chica State Ecological Reserve. Most of the Reserve is located in the Lowlands and contains the restored wetlands and Inner and Outer Bolsa Bay. The Reserve also includes two parking lots and two interpretive viewing areas and a mesa trail and a boardwalk trail in a portion of the wetlands. The upper portion of the reserve is located along the western bluff top edge of the Bolsa Chica Mesa and includes one of the two interpretive viewing areas and a trail along the entire western bluff top edge. The existing boardwalk trail in the lowland portion of the ecological reserve does not appear to be modified in the amended LUP as submitted. While the amended LUP, as submitted, proposes to retain the upper trail, it will be reconstructed following Mesa grading and access to the trails will be limited.

As submitted, the Land Use Plan proposes development that will affect the face of the Bolsa Chica Mesa. The face of the Bolsa Chica Mesa will be significantly altered during the initial mass grading in order to stabilize the bluff and to accommodate residential development. With the alteration of the bluff area the upper trail will be relocated from its current location on the western bluff top edge to within the western residential development setback area overlooking Outer Bolsa Bay. Because the location of the trail is essentially the same there will be no significant difference in the view from the trail in its current location and the view from within the residential development setback area, the proposed location.

Access to the two Bolsa Chica State Ecological Reserve parking lots and the wetland and upper trails is currently unrestricted. According to the Coastal Access and Recreation Plan, Figure 4.3-2 of the amended LUP (as submitted), access along both public trails will be limited. The details of the management of the limited access are not provided. The Ecological Reserve is owned by the State of California, State Lands Commission and managed by the State Department of Fish and Game. Neither the State Lands Commission nor Fish and Game have consented to the proposed alteration and relocation of the trail nor to restriction of access to the trails. Restricting public access to publicly owned trails is inconsistent with the Chapter 3 public access provisions of the Coastal Act unless a finding is made that access must be restricted in order to protect fragile resources. No such analysis has beenundertaken. The amended LUP is therefore inconsistent with the public access provisions of the Coastal Act and is therefore denied as submitted.

Harriett Wieder Regional Park

The LUP amendment also proposes public access and recreational facilities on the Huntington Mesa. Those provisions likewise fall short of the requirements of the Coastal Act. The portion of the Huntington Mesa within the LCP area will be developed with Harriett Wieder Regional Park, formerly known as the Bolsa Chica Regional Park. As stated above, only approximately 58 acres of the 106 acres of the regional park are within the Bolsa Chica LCP area. The Landowner/Master Developer will dedicate 49

acres of land on the Huntington Mesa to the regional park. The remaining acres are located within the City of Huntington Beach and are covered by the certified Local Coastal Program of the City of Huntington Beach. The Huntington Mesa also includes several large residential parcels within the City of Huntington Beach which are designated high density residential land use.

The current amended Land Use Plan incorporates the 1992 Bolsa Chica Regional Park General Development Plan and Resource Management Plan (GDP). Although the Bolsa Chica Regional Park General Development Plan and Resource Management Plan was approved by the Board of Supervisors it has never been reviewed by the Coastal Commission. However, because it is now proposed to be included within the amended LUP the Commission must determine whether the Bolsa Chica Regional Park General Development Plan and Resource Management Plan is consistent with the applicable Chapter 3 Coastal Act policies including the public access and public recreation provisions.

As discussed further below, the Bolsa Chica Regional Park General Development Plan and Resource Management Plan (GDP) is inconsistent with the Coastal Act provisions requiring protection of wetland resources, environmentally sensitive habitat areas, archaeological resources, natural landforms as well as public parking in the promotion of public access and public recreational use of the park. As stated above, the long term oil operations and toxic waste clean up requirements also hinder actual park development of a significant portion of the proposed regional park.

Public access to public recreation facilities, including parks, is enhanced when adequate off-street parking is provided. The narrative section of Chapter 4 of the Land Use Plan states that the regional park will provide 130 public parking spaces. However the regional park policies of the amended Land Use Plan do not specify the number of public parking spaces to be provided. Instead, the Public Access/Visitor-Serving policy for the Harriett Wieder Regional Park states that the park shall be developed consistent with the Bolsa Chica Regional Park General Development Plan and Resource Management Plan (GDP). The GDP fails to specify the number of parking spaces to be provided. The GDP states that off-street parking will be provided within three areas of the regional park and indicates the general location with a graphic. The lack of adequate on-site public parking is inconsistent with the public access and public recreation policies of the Coastal Act.

The County has already received approval for the development of one portion of the park without providing parking. In 1993 the County segmented what was to be a 15 acre first phase (Phase IA) development of the regional park and sought approval of only a 3 acre portion of the park (Increment I of Phase IA). The 15 acre segment was to contain a 40 space on-site parking lot. Partially due to strong objection from some of the adjacent residents, in conjunction with the revised project description, the County noted that on-street parking was available adjacent to the park and no on-site parking was

provided. Because only a very small segment of park was being developed the Commission did not impose public on-site parking at that time. The public access and public recreation provisions of the Coastal Act require that additional segments of the regional park include adequate on-site parking.

The public has to rely on public on-street parking adjacent to the regional park site for the modified first park phase. The area surrounding the park is developed or planned to be developed with medium high and high density housing. The streets surrounding the park are also not within the jurisdiction of the County but are located within the City of Huntington Beach. The County therefore can not ensure that the public on-street parking will remain available to park users. When public parks or other public use areas do not have adequate off-street parking and must rely on street parking, nearby residents have in some cases petitioned for preferential permit parking or illegally red curbed the street preventing public parking and thus public access to coastal recreation facilities.

One such example of how public access to parks can be lost if parking is not provided on-site is Badlands Park, now in the City of Laguna Niguel. The County of Orange conditioned the approval of a residential subdivision to dedicate land for the establishment of Badlands Park and trail system and provisions for access to the park. The County also required public access signage, a public pedestrian gate through the subdivision for public access to the park, and an easement across the entire width of the main road to allow public parking for access to the park.

At some point later the homeowners association of the approved subdivision illegally posted "no parking" signs and painted the curb red within the public easement of the main road into the park preventing the public from parking on the street and thus interfering with public access to park and trail. In 1994 the County filed suit against the homeowners association in order to regain public access to the street for parking purposes in order to restore access to the park. Accordingly, the GDP must be denied as submitted because it fails to provide adequate on-site parking as required by the public access and recreation policies of the Coastal Act.

While the GDP is not written in a format containing policies, the development plan proposes five acres of fill in and adjacent to a ravine containing riparian and wetland resources for the stated purpose of increasing useable park area and correcting a potential public safety hazard. The fill of wetlands for these purposes are not allowed under the land resources protection policies (Section 30233) of the Coastal Act. According to the GDP, three other areas of the park will be filled (150,000 cubic yards) to create more useable area.

The biological resources of the Huntington Mesa have been heavily disturbed by past and continued oil and gas operations and weed abatement activities. The mesa was once dominated by Diegan coastal sage scrub and southern coastal bluff scrub communities according to the environmental overview of the Bolsa Chica Regional Park General

Development Plan and Resource Management Plan (GDP). However there are isolated remnant coastal sage and riparian plants, such as California sage, coyote bush, toyon, elderberry, mule fat, salt grass, and arroyo willow still existing on the mesa today as shown on the Vegetative Resources Map. The central portion of the mesa contains a drainage gully containing arroyo willow, cat-tail and other riparian/wetland plants. At the base of the gully, within the lowland area (not within the regional park boundary) is a fresh water marsh wetland area. Most of the remnant environmentally sensitive plants are located in the northwestern portion of the Huntington Mesa north of Garfield Avenue as shown on the map of Vegetative Resources which follows. The GDP proposes that none of the mesa's environmentally sensitive habitat be retained in the development of the regional park. The 1992 GDP also does not propose any mitigation for the loss of the sensitive habitat. The GDP does however call for the establishment of a 15 acre environmentally sensitive habitat area (ESHA) within the regional park as mitigation for loss of an ESHA on the Bolsa Chica Mesa due to residential development plans. As discussed previously, this ESHA relocation can no longer be accomplished based the recent Appellate Court ruling concerning the Eucalyptus ESHA.

The Master landowner of the LCP area owns approximately 49 of the 58 acres which are to become part of the regional park. According to County Policy 4.2.10 (as submitted) of the Public Access/Visitor Recreation Component of the Land Use Plan, the Master Landowner/Developer has to dedicate the 49 acres to the County for regional park purposes upon final certification of the LCP. However a fairly significant portion of this land is currently leased to third parties for such uses as long term oil operations, a gas plant facility, existing oil wells, or existing pipelines. Therefore the public will not be able to access this area nor will it be developed for park use for some time. The regional park is to be developed over a period of 30 years or more due to the existing oil leases. Additionally, before the City or County can accept a land dedication offer, the long term lease must expire, the oil operations equipment and pipelines removed, and the toxic soils and other non-compatible materials have to be removed from the site.

Additionally, the LUP amendment, as submitted, proposed to relocate the 7.5 acre Eucalyptus grove raptor habitat from the Bolsa Chica Mesa to the regional park and it expand it to 20 acres. However, due to the long term regional park land acquisition and required clean up prior to park development it was unclear at the time the LUP was submitted for Commission action as to when the ESHA would be replaced on the Huntington Mesa. The recent Appellate Court decision has clarified that the proposed ESHA replacement can not take place. Though the Huntington ESHA could not result from the relocation of the Eucalyptus ESHA, a new ESHA could still be created on the Huntington Mesa based on a new development plan for the park. Other park phasing uncertainties arise from the fact that an unknown portion of the 150,000 cubic yards of fill material the County is planning to use within the park is to come from private residential sites located adjacent to the park but within the City of Huntington Beach. The County does not know when construction will occur on these residential sites. Therefore the County does not know when the 150,000 c.y. of fill will become available.

Although the regional park plan contains a three part park phasing plan that was to allow for 47 acres of the park to be developed by 1994, that phasing plan was apparently modified in 1993 when the County further segmented Phase 1A and obtained approval for development of a 3 acre portion of the park from the City of Huntington Beach and the Coastal Commission on appeal.

Because the Bolsa Chica Regional Park General Development Plan and Resource Management Plan (GDP) is inconsistent with several provisions of the Chapter 3 policies of the Coastal Act including the public access and public recreation provisions it can not be incorporated into the amended LUP as provided in County Policy 4.2.13 (as submitted). Development of the regional park must be consistent with the applicable Coastal Act land resource protection and public access and public recreation policies.

Throughout the background narrative of the Public Access/Visitor-Serving Recreation Component there is discussion of a proposed 10,000 sq. ft. interpretive/visitor center to be built in Harriett Wieder Regional Park. The formal center is planned on a portion of the 49 acres of land to be dedicated to the regional park by the master developer. County Policy 4.2.11 (as submitted) of the Land Use Plan dealing with the Harriet Wieder Regional Park states that the Park shall provide a variety of interpretive and recreational opportunities for the public, as described in the County-approved General Development Plan. However the County approved plan contains no policies and refers to the 10,000 sq. ft. visitor center only as an optional facility. The interpretive center is not shown on Table 2 of the Implementation Cost Estimate of the GDP which is a listing the park development components.

Therefore for the reasons discussed above the Commission finds that (as submitted) the Land Use Plan Amendment is not in conformance with nor adequate to carry out the public access policies of the Coastal Act.

b. APPROVAL AS MODIFIED

As detailed in the previous denial findings the Public Access/Visitor-Serving Recreation component of the LUP amendment (as submitted) is inconsistent with the Chapter 3 public access, public recreation and land resources protection (with regards to the wetland buffer and the construction of a local park within the wetlands) policies of the Coastal Act. The Commission has also made significant revisions to the LCP, through suggested modifications, in the Resource Restoration and Conservation Components (Chapter 3) of the Bolsa Chica LCP which significantly affect the Public Access/Visitor Serving Recreation Component (Chapter 4 of the LCP). Suggested modification must therefore be proposed which reconcile the Public Access/Visitor Serving Recreation Component with the Resource Restoration and Conservation Components (Chapter 3 of the LCP) and the public access and recreation policies of the Coastal Act.

In the Resource Restoration and Conservation Components (Chapter 3) of the Bolsa Chica LCP the Commission found that residential development in the lowland was not allowable. Furthermore, most of the lowland has been acquired by the State of California. The State of California and the Federal government are now working cooperatively to develop a wetland restoration plan which will include a public access component. Consequently, the access and visitor serving policies specific to the lowland areas are now obsolete and must be deleted. The following County Policies (as submitted) are hereby deleted: 4.2.9, 4.2.14, 4.2.15, and 4.2.16

In the Resource Restoration and Conservation Components (Chapter 3) of the Bolsa Chica LCP the Commission found that residential development on the lower bench of the Bolsa Chica Mesa would not be appropriate considering the ecological value of the lower bench. The Commission also found that a buffer be established between the upper and lower bench, that a buffer be established between the residential development (overlooking the lowland) and the Eucalyptus grove ESHA, and that public access trails be allowed within the twenty-five foot width portion of the buffer closest to the residential development. These decisions have a profound impact on the public access and recreation policies of the Bolsa Chica LCP as submitted which must be revised through suggested modifications.

Figure 1 (on Page 5) of this staff report represents a graphic suggested modification to bring the Public Access/Visitor-Serving Recreation component of the LUP amendment (as submitted) into conformance with the Commission's prior decisions on this LCP and the Coastal Act. **Figure 1** (on Page 5) documents that as a result of the Commission's decision to designate the lower bench Conservation that the proposed Mesa Community Park is eliminated. Furthermore, public trails that were proposed in Figure 4.3-2 within the lower bench of the Bolsa Chica Mesa and within the Eucalyptus grove have been eliminated (except for the public trail by Outer Bolsa Bay from Warner Avenue to the existing Fish and Game overlook) to protect the ecological values of the lower bench.

Section 30240 of the Coastal Act establishes that environmentally sensitive habitat areas are to be protected from significant disruptions. Extensive human use of an area can disrupt wildlife and damage native vegetation. As an example of this issue, the San Francisco Chronicle (February 10, 2000) wrote an article "When Land is Loved to Death, to Preserve the Watershed we Need to Limit Access". This article was in reference to the Crystal Springs watershed and discussed the issue of extensive human use in the form of public access on the ability of the watershed to retain its natural character.

The Bolsa Chica Mesa is in a similar predicament. Aerial photographs of the Bolsa Chica Mesa document that the area is crisscrossed by a variety of trails and roads some of which pass through ecologically sensitive areas. These trails have been uses by residents in the area and the general public as evidenced by worn paths and the observations by staff during site visits for the past eight years. The public has also

provided written evidence of long term continued use of the site for hiking and bird watching. Portions of the Mesa offer unobstructed views of the ocean. The proposed designation of the lower bench of the Mesa as Conservation consequently raises issues with Sections 30210, 30211, and 30214 of the Coastal Act because there is some evidence that over the years the Bolsa Chica Mesa has been used by the public and therefore the potential for implied dedication exists.

Section 30210 states (emphasis added):

> In carrying out the requirement of Section 4 of Article X of the California Constitution, maximum access, which shall be conspicuously posted, and recreational opportunities shall be provided for all the people consistent with public safety needs and the need to protect public rights, rights of private property owners, and **natural resource areas from overuse**.

Section 30211 states (emphasis added):

> **Development shall not interfere with the public's right of access to the sea where acquired through use** or legislative authorization, including, but not limited to, the use of dry sand and rocky coastal beaches to the first line of terrestrial vegetation.

Section 30214 states (emphasis added):

(a) The public access policies of this article shall be implemented in a manner that takes into account the need to regulate the time, place, and manner of public access depending on the facts and circumstances in each case including, but not limited to, the following:

(1) Topographic and geologic site characteristics.

(2) **The capacity of the site to sustain use and at what level of intensity.**

(3) **The appropriateness of limiting public access to the right to pass and repass depending on such factors as the fragility of the natural resources in the area and the proximity of the access area to adjacent residential uses.**

(4) The need to provide for the management of access areas so as to protect the privacy of adjacent property owners and to protect the aesthetic values of the area by providing for the collection of litter.

(b) It is the intent of the Legislature that the public access policies of this article be carried out in a reasonable manner that considers the equities and that balances the rights of the individual property owner with the public's constitutional right of access pursuant to Section 4 of Article X of the California Constitution. Nothing in this section or any amendment thereto shall be construed as a limitation on the rights guaranteed to the public under Section 4 of Article X of the California Constitution.

(c) In carrying out the public access policies of this article, the commission and any other responsible public agency shall consider and encourage the utilization of innovative

> access management techniques, including, but not limited to, agreements with private organizations which would minimize management costs and encourage the use of volunteer programs.

When evaluating the conformance of a project with 30211, the Commission cannot determine whether public prescriptive rights actually do exist; rather, that determination can only be made by a court o flaw. However, the Commission is required under Section 30211 to prevent development from interfering with the public's right of access to the sea where acquired through use or legislative authorization. As a result, where there is substantial evidence that such rights may exist, the Commission must ensure that proposed development would not interfere with any such rights.

Consequently, the Commission must evaluate the LCP amendment to determine the extent to which the public access to be provided by the LCP amendment is equivalent in time, place, and manner to any public use that has been made of the site in the past. To the extent public access to be provided by the LCP amendment as certified is equivalent, the LCP amendment as certified will not interfere with any existing public access rights. Therefore, if the Commission determines that the access to be provided by the LCP amendment as certified is in fact, equivalent in time, place, and manner to the access use made of the site in the past, the Commission need not do an exhaustive evaluation to determine if substantial evidence of an implied dedication exists because regardless of the outcome of the investigation, the Commission could find the LCP amendment as certified consistent with Section 30211.

Consistent with the requirements of Sections 30210, 30211, and 30214, the Commission finds that keeping the public trail open from Warner Avenue along the Bolsa Chica Mesa overlooking Outer Bolsa Bay to the existing Fish and Game overlook and providing a public trail (within the buffer) and a scenic public road on the upper bench of the Mesa, the public is provided with adequate access equivalent in time, place and manner to any prescriptive rights which may have accrued on the property and is appropriate, given the fragility of the natural resources in the area. First, the existing public trail will be kept open. This trail will continue therefore to provide the same level of public access as currently exists and will provide the public with access to the same general areas previously affording access to the public. Second the public trail within the buffer and the scenic public road will provide the public with new public access which does not currently exist on the upper bench of the Mesa. These public trails are shown in **Figure 1** on Page 5. Figure 4.3-2 of the Bolsa Chica LCP (as submitted) and any other figure which shows public access and recreation opportunities on the Bolsa Chica Mesa shall be modified to conform to the public and recreation opportunities located on the Mesa to **Figure 1** (on Page 5).

Therefore, consistent with the requirements of Sections 30210 and 30214 of the Coastal Act which recognize that recreational opportunities may be regulated for purposes of protecting natural resources from overuse, the Commission finds that public trails shall

not be established within environmentally sensitive habitat areas. The absence of these trails is shown in **Figure 1** (on Page 5). Figure 4.3-2 of the Bolsa Chica LCP (as submitted) and any other figure which shows public access and recreation opportunities shall be modified to conform to **Figure 1**.

To assure consistency of the Bolsa Chica LCP with the public access and recreation policies of the Coastal Act and the ESHA policies of the Coastal Act, County Policies (as submitted) 4.2.1 and 4.2.2 have been modified to state that public access and recreational facilities shall be located and designed so that there will be no adverse impacts to wetlands or ESHA resources. New policies have also been added. Policy 4.2.3, 4.2.4, 4.2.6, 4.2.13, and 4.2.14 (NEW) have been added to require that the trail system be consistent with Figure 4.3-2 which is based on **Figure 1** (on Page 5) of this staff report. Additional modifications include the provision for the scenic public road on the upper bench of the Bolsa Chica Mesa just inland of the buffer, and for thirty public parking spaces.

To assure that the development of the public amenities are pursued in a timely manner a new policy is being added and one existing policy is being modified. The new policy (4.2.11) is being added through a suggested modification. This new policy (4.2.11) requires that all new trails be improved prior to issuance of the first coastal development permit for residential construction. County Policy 4.2.6 (as submitted) is also being modified to require that all park dedications shall occur prior to issuance of any development for subdivision of the LCP area. Policy 4.2.20 (as submitted) is being modified to require that all local parks be improved by the landowner/master developer or subsequent developer. This phasing is necessary to assure that the public amenities are developed and made available (in a timely manner) to the public prior to the lower priority residential development. Should the residential development occur independent of the public amenities there would be no guarantee that the public amenities would ever be provided consistent with the Coastal Act mandates for the provision of public access.

Also Harriett Wieder Regional Park must be developed in a manner that minimizes landform alteration, protects archaeological resources and provides adequate off-street public parking. To achieve these objectives County Policies 4.2.6 and 4.2.10 (as submitted) have been modified to require that at the time of the first Coastal Development Permit for subdivision of the LCP area, the landowner/master developer shall make any required dedications. County Policy 4.2.7 (as submitted) has been modified to require adequate public parking. County Policy 4.2.11 (as submitted) has been modified to require that the Park provide a variety of interpretive and recreation opportunities as part of the LCP rather than as described in the now obsolete General Development Plan. County Policy 4.2.13 (as submitted) has been modified to delete references to the obsolete General Development Plan and to require that a new General Development Plan must be submitted to the Commission through the LCP amendment process.

The Land Use Plan, as modified through these suggested modifications, will be consistent with these Coastal Act provisions in that development of the Bolsa Chica Mesa with low priority residential use will be partially offset by the provision of meaningful public access, public recreational opportunities, and convenient public parking; maximum public access will be provided in a manner that reduces conflicts between the public and the future residential property owners, and the siting of the Mesa road immediately landward of the wetlands buffer instead of housing properly considers and protects the view to and along the ocean and coastal wetlands from this unique coastal resource area as mandated.

Furthermore, the proposed modifications are a benefit to the public access/visitor-serving recreation component of the LUP since it would remove the potential conflict between the new residents of the LCP area and the public park and trail users by requiring a bluff edge scenic road that would allow the public direct access to the wetlands viewing trail within the bluff top wetlands buffer area. The bluff edge road would be located immediately landward of the fifty foot wide wetland buffer and allow public parking on both sides. Those members of the public wishing to gain access to the more scenic passive park and trails at the bluff edge will not have to traverse the narrow park through the center of the private residential community but will also have direct access to the public use area. A comprehensive signage program for the public access/visitor recreation facilities of the LCP area is also needed in order to find that public access has been maximized. Only, if the Mesa Connector Road is realigned or an additional Mesa bluff edge scenic road is included on the Bolsa Chica mesa to provide the public with direct access to the six acre public bluff edge park and public trails within the wetlands bluff top buffer and the provision of adequate public parking is the Land Use Plan amendment consistent with Sections 30222, 30210, and 30251 of the Coastal Act.

Only as modified is the Public Access/Visitor Recreation component of the LUP amendment consistent with the applicable Chapter 3 policies of the Coastal Act.

C. REGIONAL CIRCULATION AND TRANSPORTATION COMPONENT CHAPTER 5 OF THE LAND USE PLAN AMENDMENT

a. DENIAL OF THE LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan

The 1986 LUP permitted a 75 acre marina/visitor serving commercial complex and up to 5,700 residential units. Significant transportation/circulation improvements were necessary to support this level of development. Some of the major components were:

- Widening of PCH between the downcoast project boundary and the proposed ocean inlet (near Warner Avenue) to modified Major Arterial Highway standards (six lanes separated by a 10 ft. median).

- Realignment and bridging of PCH to traverse Bolsa Chica Mesa between the existing Warner Avenue/PCH intersection and the proposed ocean inlet.

- A four lane divided highway to cross the Lowlands connecting Bolsa Chica Street on the north with Garfield on the south (Cross-Gap Connector).

- Extension of Springdale Street, Graham Street and Talbert Avenue into the Lowland and intersecting with the Cross-Gap Connector;

- Realignment of Warner Avenue to intersect with the realigned PCH on the Bolsa Chica Mesa; and

- Secondary arterial connections between Bolsa Chica Street and PCH adjacent to the marina/commercial complex and an additional secondary arterial connection across Bolsa Chica Mesa between Warner and the Bolsa Chica Street/PCH connection

(2). Current LUP Amendment

The LUP amendment, as submitted, proposes up to 3,300 residential units, potentially up to 100,000 square feet of neighborhood commercial development, a 58 acre regional park and 25 acres of local park land on the Bolsa Chica Huntington Mesas and in the Lowlands in addition to an approximately 1,100 acre wetland ecosystem restoration effort, and pedestrian and bicycle trails. The residential units and commercial development would be built in phases and expected to be completed by the year 2010. The proposed level of residential and commercial development will increase traffic on adjacent roadways. Because the LCP area is located opposite the Bolsa Chica State Beach and also includes within its boundary a significant coastal resource, the Bolsa Chica Wetlands, traffic impacts could have the potential of adversely impacting public access to the coast.

The Land Use Plan amendment, as submitted, eliminates the Cross-Gap Connector through the Lowlands. It is replaced with a new secondary arterial connecting Graham Street on the north with Talbert Avenue on the south. Springdale Street is also extended into the Lowland area. Pacific Coast Highway will remain in its current alignment. According to the EIR, the level of development proposed in the Bolsa Chica LCP does not require the widening of Pacific Coast Highway. The Landowner/Master developer has to nevertheless dedicate the necessary right-of-way for the future widening of Pacific

Coast Highway to the ultimate width of 120 feet south of Warner Avenue. Although PCH does not need to be widened to accommodate the level of residential development proposed in the LCP, Warner Avenue (based on the LCP as submitted) will need to be widened to the Primary Arterial width requiring a 30 foot right-of-way dedication on the Bolsa Chica Mesa in order to accommodate the LCP level of development. Warner Pond, a wetland on the Bolsa Chica Mesa is located immediately adjacent to Warner Avenue and would have been eliminated when the road is widened in the proposed LCP as submitted.

(3). Applicable Coastal Act Policies

The Chapter 3 policies of the Coastal Act that pertain to circulation and transportation include Sections 30250 and 30252. In summary, these Coastal Act provisions require that new development include adequate parking facilities, public transit opportunities, and non-automobile circulation within the development allowed by the LCP so that public access to the coast and coastal resources are not adversely impacted.

(4). Coastal Act Consistency

The EIR prepared for the Bolsa Chica LCP includes a traffic study by Robert Kahn, John Kain & Associates (August 12, 1994) entitled Bolsa Chica Project Traffic Analysis Report. The goal of the County's various traffic management programs is to eliminate or minimize the impact of changes in land use on the transportation system. A traffic impact is considered significant if a project contributes measurable traffic to a location and if the project traffic contribution substantially and adversely changes the Level of Service at the location.

The EIR for the amended Land Use Plan identifies adverse traffic impacts that would result from the LCP build-out provided for in the amended Land Use Plan and proposes the necessary roadway and intersection improvements to mitigate these impacts. However, the circulation and traffic component of the amended Land use Plan which incorporates these improvements, is inconsistent with the Coastal Act because the Area Traffic Improvement Program (ATIP) would allow construction of homes to be approved before required circulation improvements are implemented as allowed in Policy County 5.2.8 (as submitted). The Land Use Plan sets up an ATIP Advisory Committee to monitor required traffic improvements. The City of Seal Beach is not a member although roadways within their jurisdiction are included in the ATIP. Without the participation of the City of Seal Beach on the Advisory Committee there is no guarantee that necessary improvements in Seal Beach will be carried out. As submitted, the amended Land Use Plan contains a policy that would allow development to proceed even if the necessary traffic improvements of the ATIP are not implemented due to "non-cooperation" of the Advisory Committee. Additionally, the EIR traffic projections indicate that with the level of development proposed in the Land Use Plan amendment as submitted would result in significant adverse traffic and circulation impacts. Thus the amended Land Use Plan, as submitted, is inconsistent with the applicable Chapter 3 policies of the Coastal Act.

However, as a consequence of changes to the Bolsa Chica Local Coastal Program since its initial submittal resulting from the sale of the Lowlands to the State of California, the reduction in the number of residential units, and the elimination of optional commercial development; the traffic analysis submitted with the LCP is no longer appropriate for evaluating the traffic impacts created by the proposed development.

Additionally, as submitted the ATIP policies would allow the approval of a coastal development permit for residential development without assurance that the traffic improvements that are the sole responsibility of the Landowner/Master Developer as well as those that the Landowner/Master Developer is only partially responsible are provided. This would occur because ATIP assurances are tied to the issuance of building permits and not approval of the coastal development permit.

Therefore the Commission must deny the Land Use Plan amendment as submitted since it is not consistent with Sections 30250 and 30252 of the Coastal Act.

b. APPROVAL AS MODIFIED

By substantially reducing the total number of residential units, and with further review of traffic impacts, the Bolsa Chica LCP can be approved without the necessity of filling Warner Pond. The traffic consultants who prepared the traffic analysis for the Bolsa Chica LCP have provided further comments on this issue. In a letter dated September 9, 1997 (Exhibit 3), they have concluded that neither Warner Avenue nor Pacific Coast Highway, where located adjacent to Bolsa Chica, will need to be widened if the density of the Mesa development is reduced. In fact, their conclusion is that even when the region is built out in the year 2020, traffic volumes on Warner Avenue are projected to operate within its existing capacity so that Warner Avenue will not need to be widened. The fill of Warner Avenue Pond is necessary only if Warner Avenue is widened. If widening of Warner Avenue can be avoided, the fill of Warner Avenue pond can also be avoided. Therefore, reducing the total number of residential development on the Mesa to 1,235 homes will avoid widening of Warner Avenue and consequently the fill of Warner Avenue Pond will not be necessary.

Consequently, County Policies 5.2.2, and 5.2.13 (as submitted) have been deleted since Mesa residential development has been reduced and Lowland residential development has been eliminated. County Policies 5.2.1, 5.2.5 5.2.7, 5.2.8, 5.2.9, 5.2.10, 5.2.11, 5.2.14, and 5.2.17 (as submitted) have been modified. The modifications to the circulation/transportation component eliminate the need for the ATIP Advisory Committee that oversees traffic improvements, and assure that traffic improvements are required as a condition of the coastal development permit and are constructed prior to construction of the homes requiring the improvements.

Further, the modifications make it clear that the incorporation of an ATIP within the coastal zone requires an LCP amendment. Finally, the modifications encourage the use of bicycles to visit the LCP area thereby reducing arrivals by automobile.

Only if modified as suggested is the regional circulation/transportation component of the LUP amendment consistent with the applicable Chapter 3 provisions of the Coastal Act.

D. DEVELOPMENT COMPONENT
CHAPTER 6 OF THE LAND USE PLAN AMENDMENT

a. DENIAL OF LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan

The previously certified 1986 LUP approved up to 5,700 residential units on approximately 500 acres on both the Bolsa Chica Mesa and in the Lowlands. Also proposed in the 1986 LUP was a 60 acre marina complex which included 1,300 boat slips and other associated marina development and a 15 acre visitor-serving retail/restaurant/overnight lodging commercial complex. The previous submittal included 915 acres of restored wetlands, a navigable ocean entrance, a 130 acre Bolsa Chica Regional Park and trails linking the Lowlands and the regional park and the Bolsa Chica State Beach across Pacific Coast Highway. The previous submittal was an LUP only and the details for the phasing of the development were not included.

(2). Current LUP Amendment Proposal

The Land Use Plan amendment, as submitted, would result in a less intensive development than the 1986 proposal with a total of 3,300 residential units spread among the Bolsa Chica Mesa and the Lowlands. Of the 3,300 residential units proposed, up to 900 were to have been in the lowland. The lowland development proposal also included a Wetlands Restoration Program, an 8 acre passive and active local park, a fire station and a public bicycle/pedestrian trail which would ring the wetlands ecosystem area. However, since the original submission of the LCP most of the lowland area has been acquired by the State of California. As a result, lowland residential development including associated infrastructure and the Wetland Restoration Program are no longer proposed.

The Landowner/Master Developer will be dedicating 49 acres of land for the development of the Harriett Wieder Regional Park (formerly Bolsa Chica Regional Park). The County's 1992 development plan for the ultimate 106 acre regional park is also incorporated into the LUP amendment as submitted.

(3). Applicable Coastal Act Policies

Most of the Chapter 3 policies of the Coastal Act pertain to the new development component of the amended Bolsa Chica LUP. The marine resources policies of the Coastal Act protect wetlands and allow them to be filled only for certain specific uses and only under certain circumstances; the land resources protection policies protect environmentally sensitive habitat areas and archaeological and paleontological resources; the development policies protect the scenic and visual qualities of the coastal areas, and require adequate public access and parking for new development.

(4). Coastal Act Consistency

The Bolsa Chica LCP, as submitted proposed up to 900 residential units in the Lowlands. Lowland residential development would have resulted in the fill of approximately 18% of the wetlands. The residential development in the Lowlands, however, was not found to be an allowable use pursuant to Section 30233 of the Coastal Act in the WETLANDS/BIOLOGICAL RESOURCE POLICIES (page 229) of this report.

The development policies of the Land Use Plan amendment as submitted are not consistent with the protection of marine resources and the public access/public recreation policies of the Coastal Act. Further, as submitted the development policies do not ensure that the general public will have access to all of the recreational facilities of the LCP area. Finally, the plan does not ensure that useable open space or parking areas will not be reduced by new infrastructure and utilities if they can not be placed underground.

b. APPROVAL AS MODIFIED

The Development Component of the Land Use Plan amendment must be modified to bring it into conformance with the marine resources and public access/public recreation policies of the Coastal Act. First, as previously discussed lowland residential development and the Wetland Restoration Program have been deleted from the Bolsa Chica LCP. Also deleted from the LCP is the provision for neighborhood commercial development. As a result all policies which reference lowland residential development and the neighborhood commercial development must be either deleted or modified to eliminate the references to lowland residential development or the neighborhood commercial development. County Policies 6.2.5, 6.2.6, 6.2.10, 6.2.11, 6.2.17 and 6.2.20 are therefore deleted.

County Policy 6.2.1 (as submitted) has been modified to limit the number of residential units on the Mesa to 1,235 units. This modification is necessary to minimize the impacts of proposed residential development on environmentally sensitive habitat areas, specifically Warner Avenue Pond and the Eucalyptus grove ESHA. By limiting development, the proposed project would not trigger the requirement that Warner Avenue be widened. Under the LUP amendment, as submitted, the increased traffic created by the project would have generated the Development Agreement requirement to widen Warner Avenue which would have resulted in the loss of Warner Pond which is both a wetland and an environmentally sensitive habitat area. In line with the change to County Policy 6.2.1 (as submitted) County Policy 6.2.2 (as submitted) has been modified to remove the reference to the lowland development and to limit residential densities to that identified in the Planned Community Statistical Table.

Consistent with the Commission's prior suggested modifications, County Policy 6.2.3 (as submitted) must be modified to provide for the maximum protection of the wetlands ecosystem area from impacts of adjacent residential development. Specific suggested

modifications concerning designating the lower bench of the Mesa as Conservation and the designation of buffers were made in the Resource Restoration and Conservation Components section. County Policy 6.2.16 (as submitted) makes it clear, as modified, the circumstances under which new utilities to serve adjacent residential areas may be allowed within the wetlands.

In terms of local park and community policies, County Policy 6.2.7 (as submitted) is modified to ensure that all of the community facilities of the LCP area provide public coastal access. County Policy 6.2.9 (as submitted) has been modified to clarify that public parking is to be provided, and that an enhanced landscaping plan may be located at the community entrances. County Policies 6.2.15 and 6.2.16 (as submitted) have been modified to require that any utilities which are located within a recreation or open space area shall be placed below grade where feasible and only consistent with Section 30233(a)(5) of the Coastal Act and to ensure that useable public recreation or public parking areas are not reduced due to infrastructure siting. Finally, a new policy 6.2.7 (new) is being inserted to state that a fifteen acre school site will be designated adjacent to Los Patos on the upper bench of the Bolsa Chica Mesa. However, in the event that the School District does not need to develop the site for a school, the site can be used for residential development provided that the residential cap of 1,235 residential units is not exceeded.

Only as modified are the development policies consistent with the applicable Chapter 3 policies of the Coastal Act.

E. OIL PRODUCTION COMPONENT CHAPTER 7 OF THE LAND USE PLAN AMENDMENT

a. DENIAL OF THE LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan

Oil production in Bolsa Chica would be allowed to continue and would be phased out as reserves are depleted. The 1986 Land Use Plan also allowed for the consolidation of facilities to facilitate the implementation of the wetlands restoration effort.

(2). Current LUP Amendment Proposal

Oil production in Bolsa Chica would be allowed to continue. Phases 1 & 2 of the Wetland Restoration program are not dependent on the phase out of oil production. However, the remaining phases of the Wetland Restoration Program (Phases 3-6) would be dependent on the depletion of the oil reserves. The amended Land Use Plan, as submitted,

acknowledged the possibility of early public acquisition and abandonment of oil leases to facilitate accelerated implementation of the developer sponsored Wetlands Restoration Program.

Oil production is intended to be carried out in a manner to protect biological resources to the maximum feasible. To achieve this objective an Oil Spill Prevention Control and Countermeasure Plan and Oil Spill Contingency Plan have been prepared.

(3). Applicable Coastal Act Policies

Bolsa Chica is an oil producing area. Sections 30260 and 30262 of the Coastal Act allow the continued use of an area for oil production. Oil and gas operations are allowed if adverse environmental effects are mitigated to the maximum extent feasible and the development is performed safely. Section 30262 also requires that new or expanded facilities be consolidated to the maximum extent feasible unless consolidation would have adverse environmental consequences.

Though, oil operations are a permissible use at Bolsa Chica, Bolsa Chica is a tidally influenced wetland that must be protected from environmental damage. Thus oil production at Bolsa Chica is constrained by Sections 30230, 30231, and 30232 of the Coastal Act. Section 30232 of the Coastal Act mandates that proposed development protect the environment from the spillage of hydrocarbon products. Additionally, Coastal Act sections 30230 and 30231 mandate the marine resource be maintained and the biological productivity and quality of coastal waters be maintained. The lowland portions of Bolsa Chica are wetlands and oil production occurs in the wetlands. The spillage of hydrocarbons from these producing well into the wetlands would have an adverse effect on the biological resources. Therefore it is critical that the Bolsa Chica Local Coastal Program address this issue.

(4). Coastal Act Consistency

The Land Use Plan Amendment, as submitted, contains policies which do not fully implement the Coastal Act policies cited above. The proposed Land Use Plan, as submitted, contains policies which allow the continued production of hydrocarbons. However, lacking are umbrella policies which clearly restrict oil production from adversely affecting the wetlands and for the consolidation of facilities if practical. Specific policies, such as County Policy 7.2.9 (as submitted) exist. County Policy 7.2.9 (as submitted) of the Oil Production Component calls for an oil spill prevention and control and countermeasure plan which would clean-up an oil spill after it occurs. However, County Policy 7.2.9 (as submitted) does not actually promote the concept that oil production should be carried out in a manner compatible with the protection of biological resources. To guarantee that oil production will not have an adverse impact on the environment, the

Oil Production Component of the Land Use Plan Amendment must be modified to address these concerns.

Further, County Policy 7.2.9 (as submitted) of the Oil Production Component, as submitted, presents a procedural problem. County Policy 7.2.9 (as submitted) calls for incorporation of the Oil Spill Prevention Control and Countermeasure Plan, and the Oil Spill Contingency Plan when updated, directly into the Wetlands Restoration Program. The Commission recognizes that the intent of these plans is to provide for the cleanup of an oil spill should one occur. However, the possibility exists, that the procedures contained in these plans may not be consistent with the wetlands restoration program that is currently being developed.

Therefore, for the reasons enumerated in the paragraphs above, the Commission finds that, as submitted, the Oil Production policies of the Land Use Plan are not in conformance with nor adequate to implement Sections 30232, 3021, 30230, 30260 and 30262 of the Coastal Act regarding the protection against the spillage of petroleum products, the consolidation of facilities, minimizing adverse environmental impacts, and the maintenance of marine resources to promote biological productivity and the quality of coastal waters.

b. APPROVAL OF THE AMENDED LAND USE PLAN AS MODIFIED

To bring the Oil Production Component, as submitted, into conformance with the Coastal Act; County Policy 7.2.9 has been modified and a new County Policy 7.2.10 (new) has been added. New development for purposes of oil production would be any new development not excluded by the Commission's Resolution of Exemption E-2-15-73-71. Exemption E-2-15-73-71 allows existing oil operations to continue and exempts most existing operations and maintenance from the requirement to obtain a coastal development permit.

Though the Wetlands Restoration Program, as submitted, has been deleted from the Bolsa Chica LCP, a new wetlands restoration program has been undertaken. County Policy 7.2.9 (as submitted) has been modified to require that the Oil Spill Prevention, Control, and Countermeasure, and Oil Spill Contingency Plans which are incorporated into a future wetlands restoration program be consistent with any Commission approved wetland restoration plan. To promote consolidation, a new County Policy 7.2.10 (new) has been added. The consolidation of new facilities would be an integral component of the Implementation Program since it would maximize opportunities to conduct wetland restoration while still allowing oil production to continue.

Since the wetlands restoration program in the LCP, as submitted, is no longer part of the LCP, minor wording changes have been made to County Policies 7.2.1, 7.2.3, 7.2.5, 7.2.8, and 7.2.9 (as submitted) to clarify that oil production operations must still be

carried out in a manner consistent with any future wetlands restoration plan that may be adopted.

Therefore, as modified, for the reasons described in the paragraphs above, the Commission finds that the Land Use Plan Amendment is in conformance with and adequate to carry out Sections 30230, 30231, 30232, 30260, and 30262 of the Coastal Act regarding the protection against the spillage of petroleum products, maintenance of marine resources, and biological productivity and quality of coastal waters.

F. FINANCING AND PHASING COMPONENT CHAPTER 8 OF THE LAND USE PLAN AMENDMENT

a. DENIAL OF THE LAND USE PLAN AMENDMENT AS SUBMITTED

(1). 1986 Land Use Plan

The previous 1986 LUP did not provide any detailed financing and phasing for the wetland restoration and community development components. A Phase I Public Facilities Management and Financing Plan (PFMF) was to be reviewed separately from the LUP and a Phase II PFMF was to be developed at the Implementation Plan stage of the LCP. Finally, a wetland restoration phasing plan was to be developed at the LUP Confirmation Phase.

(2). Land Use Plan Amendment

The Financing and Phasing Component of the amended Land Use Plan, as submitted, sets forth the phasing and financing policies. These policies relate to how wetlands restoration and community development will be phased and financed. Due to the complex interrelationship among oil production, wetlands restoration, and the capital required over time to construct the public and private improvements, the specifics of phasing and financing are important factors. In particular the timing of phasing is closely tied to the phase out of oil production.

(3). Applicable Coastal Act Policies

The Coastal Act requires through policies contained in Chapter 3 that development be designed in such a manner to minimize adverse impacts to coastal resources, that coastal access be promoted, and to mitigated adverse impacts if the adverse impacts can not be avoided. Therefore, financing and phasing provides one of the mechanisms to address how Coastal Act concerns with a proposed development can be resolved to

assure that the development complies with the Coastal Act. All the Coastal Act policies contained in Chapter 3 of the Coastal Act apply.

(4). Coastal Act Consistency

The proposed Land Use Plan amendment, as submitted, stated that there is a complex interrelationship between oil production, wetland restoration, and the capital required to construct public and private improvements for the approved LCP development. The Land Use Plan amendment, as submitted, further stated that the Wetlands Restoration Plan (WRP), a portion of the Implementation Plan, contains the more detailed wetlands restoration phasing policies. However, proposed Lowland residential development has been deleted from the Bolsa Chica LCP based on the finding that the fill of wetlands for residential development was not an allowable use. Since the wetland restoration program was to be funded by Lowland residential development, denial of residential development also resulted in the elimination of the wetland restoration program from the LCP. Additionally, a majority of the lowland area has been acquired by the State of California and a new wetland restoration plan is currently under design. Therefore, the Financing and Phasing Component (Chapter 8) of the LCP, as submitted, is inconsistent with Chapter 3 of the Coastal Act and must be denied as submitted.

b. APPROVAL AS MODIFIED

County Policy 8.2.2 (as submitted) must be deleted in order to find the amended Land Use Plan consistent with Chapter 3 of the Coastal Act. Deletion of this policy makes it clear that all development must be fully consistent with the Bolsa Chica Local Coastal Program.

Since the wetland restoration program as submitted has been deleted, policies 8.2.4 and 8.2.5 (as submitted) and Table 8.1 are no longer applicable and must be deleted. County Policies 8.2.3 and 8.2.6 (as submitted) have been modified to recognize that public amenities be open to the public. These modifications now renders the amended Land Use Plan internally consistent.

Only as modified is the Financing and Phasing Component of the amended land Use Plan consistent with the applicable Chapter 3 policies of the Coastal Act.

G. DEFINITIONS
CHAPTER 9 OF THE LAND USE PLAN AMENDMENT

Some of the definitions contained in the Land Use Plan amendment have been revised to bring them into conformance with the Coastal Act. The Commission finds, that as revised, the definitions section of the Land Use Plan amendment is in conformance with and adequate to carry out the policies of Chapter 3 of the Coastal Act.

IX. FINDINGS FOR DENIAL OF THE COUNTY OF ORANGE'S IMPLEMENTATION PROGRAM, AND APPROVAL WITH MODIFICATIONS

The following pages contain the specific findings to support the modifications imposed by the Commission that are contained in the Implementation Plan Suggested Modifications. The findings are organized by topic within the four implementation documents. The Implementation Plan, as submitted, consists of three principal documents: the Planned Community Program, the Wetlands Restoration Program, and a development agreement between the Koll Real Estate Group (now Hearthside Homes) and the County of Orange.

The regulation numbers shown below conform to the Bolsa Chica Local Coastal Program as published by the County of Orange on December 14, 1994 which was submitted to the Commission in June 1995. Additionally the Implementation Program regulations incorporate changes made to department names and titles as a consequence of a reorganization by the County of Orange. The addition of new regulations or the deletion of regulations (as submitted) will affect the numbering of subsequent regulations when the County of Orange publishes the final Bolsa Chica LCP after Commission certification. Regulations which must be simply renumbered and do not otherwise require any modifications will not be shown.

<u>Changes in Circumstances Since Original Submittal of Implementation Program.</u>

The Planned Community Program, as submitted, incorporated Section 7-9 of the Orange County Zoning Code by reference. However, as a result of a modification to Section 30603 of the Coastal Act, Section 7-9-118.6 of the Orange County Zoning was no longer in compliance with Section 30603 of the Coastal Act. At the Commission's public hearing of January 11, 1996 on the Bolsa Chica LCP, the Commission found that certain portions of Section 7-9 of the Orange County Zoning Code needed to be modified and incorporated suggested modifications into the Bolsa Chica LCP. Specifically the Commission found that the noticing procedures were not consistent with Section 30603 of the Coastal Act and Section 13571 of the California Code of Regulations.

Section 30603 of the Coastal Act was modified in 1994 and became effective in 1995 by Assembly Bill 3427. Assembly Bill 3427 amends the Coastal Act by clarifying that a local government action on a coastal development permit pursuant to a certified local coastal program becomes a final local government action on the tenth working day from the date the Commission receives notice of the action. The amendment adds a requirement that local governments send notice of action on a coastal permit to the Commission by certified mail within seven calendar days from the date of action. Thus, challenges to a local government action on a coastal development permit must be filed within ten working days of the date the Commission receives the required notice from the local government.

Section 7-9-118.6, as submitted with the Bolsa Chica Local Coastal Program did **not** contain concise language which defined that the Notice of Final Action is to be mailed to the Commission after all rights to appeal have been exhausted and that the ten working day appeal period begins on the day the Commission receives the Notice of Final Action. The Commission found at it's January 11, 1996 meeting that Section 7-9-118.6, as submitted, must be incorporated into the Bolsa Chica LCP as modified to conform to Section 30603 of the Coastal Act so that it successfully implements the Land Use Plan.

The County of Orange subsequently submitted an LCP amendment to the Commission to update Section 7-9 of the Zoning Code. On November 14, 1996 the Commission approved this LCP amendment. This LCP amendment applied to five County LCP segments (Newport Coast, Sunset Beach, Emerald Bay, Aliso Viejo, and Bolsa Chica). Since, the current version of the Orange County Zoning Code incorporates the Commission's suggested modifications to the Bolsa Chica LCP it is unnecessary to reiterate the changes to Section 7-9 of the Zoning Code in this report.

A. PLANNED COMMUNITY PROGRAM

The Planned Community (PC) Program is divided into ten chapters plus additional sections covering definitions, legal description for Bolsa Chica, and an appendix. The first chapter contains the purpose and objectives of the regulatory document followed by Chapter Two, General Regulations. The first chapter does not contain any standards or regulations but contains information such as the location of the LCP area, purpose, organization of the LCP and CEQA requirements. It also contains three maps including a planning process flow chart and a flow chart of the LCP components.

1. PURPOSE AND OBJECTIVES

a. Denial as Submitted

The Implementation Plan of the Bolsa Chica Local Coastal Program is composed of the Planned Community Program (PC Program), the Wetlands Restoration Program (WRP) and the Bolsa Chica Development Agreement between the County of Orange and the Signal Bolsa Corporation, a wholly owned subsidiary of Hearthside Homes (formerly the Koll Real Estate Group). These findings pertains to the Planned Community Program (PC) only.

Chapter 1 of the Planned Community Program is entitled "*Purpose and Objectives*". This short chapter is not written in a form that contains actual regulations but includes sections dealing with the location of the LCP area, purpose, organization of the Local Coastal Program and CEQA requirements. It also contains three maps showing the location of the LCP area, a planning process flow chart and a flow chart of the LCP components.

Chapter One of the Planned Community Program does not conform to and is inadequate to carry out the LUP amendment with regards to Figure 1.3, a flow chart of the LCP components and with the LCP components. Figure 1.3 of the submitted implementation program is a flow chart entitled "*Bolsa Chica Local Coastal Program*" and illustrates the three parts of the LCP (the Land Use Plan, Planned Community Program and the Wetlands Restoration Program). Part I of the LCP is identified as the Land Use Plan or LUP. The box immediately following is entitled "*DESCRIPTION/RATIONALE FOR CONFIRMATION LAND USE PLAN*". This box implies that the items which flow from it are part of a "Confirmation Land Use Plan". This reference to a “Confirmation Land Use Plan” is not accurate as explained in the findings of approval. Additionally, the State of California acquired much of the Bolsa Chica Lowland and the developer is no longer proposing residential development in the lowland area. Consequently the “*Wetlands Restoration Program*” is now obsolete due to this changed circumstance. Furthermore, the County of Orange (through a letter dated November 29, 1999) withdrew the “*Bolsa Chica Development Agreement*” from the Implementation Program. Based on these changed circumstances, the “*Purpose and Objectives*” chapter is not in conformance with and does not adequately carry out the Bolsa Chica Land Use Plan amendment as certified.

b. Approval if Modified

Early on in the LCP process the staff of the Orange County Environmental Management Agency (EMA) and Coastal Commission staff had discussions as to whether or not the current submittal was a completion of the Confirmation process called for in the 1986 Bolsa Chica LUP, whether the submittal is a "*new submittal*", or a Land Use Plan amendment. Commission staff previously determined that the current Land Use Plan submittal is an amendment to the 1986 LUP. The County accepted this determination and formally submitted the LUP as an amendment to the 1986 Plan. The transmittal resolution of the Board of Supervisor, dated December 14, 1994 states that the County prepared "*an amendment to the 1986 LUP along with an accompanying Implementing Actions Program as required by Section 30513 of the Coastal Act*" and transmitted this along with a Confirmation review package. Further, the Land Use Plan document is entitled, "*Bolsa Chica Local Coastal Program Land Use Plan (First Amendment)".*

In order to bring the Purpose and Objectives chapter of the Planned Community Program into conformance with the Land Use Plan submittal, Figure 1.2 must be deleted and Figure 1.3 must be modified as set forth in the “*Implementation Suggested Modifications*” section of this report. Additionally several global text changes are necessary. First, to recognize that the “*Wetlands Restoration Program*” and the “*Bolsa Chica Development Agreement*” are no longer part of the implementation program for the Bolsa Chica LCP any text referencing the “*Wetlands Restoration Program*” or the “*Bolsa Chica Development Agreement*” as part of the LCP shall be deleted. The next global text revision relates to the fact that the County of Orange renamed several of its

divisions since the Bolsa Chica LCP was submitted. Consequently, all obsolete titles shall be revised. For example the "*Environmental Management Agency*" is now "*Planning and Development Services*". Only if modified as stated herein and as specifically written in the "*Implementation Suggested Modifications*" section of this repor,t is the Planned Community Program in conformance with and adequate to carry out the applicable policies of the Bolsa Chica Land Use Plan amendment as certified.

2. GENERAL REGULATIONS

a. Denial as Submitted

Chapter Two of the Planned Community Program contains the general regulations which all development within the LCP area is subject to. In addition to the general regulations, most Planning Areas are subject to specific regulations and standards. The General Regulations are comprehensive and contain 48 pages of standards regarding general provisions, special provisions, and conditions of approval. The section on general provisions contain standards such as procedural requirements, overlay district requirements, and statements that all development must be consistent with existing specific Zoning Code and General Plan requirements. The section on special provisions requires that the development allowed under the PC Program comply with the PC Development Map and Statistical Table, and other provisions such as residential density, Planning Area boundaries, flood control, public schools, local park requirements, water conservation, private street and driveway standards, public road design, traffic improvement program, archaeological and paleontological resources, utilities, fire protection, interim and temporary land uses, and air quality control regulations. Finally, the section on conditions of approval relate to requirements that the applicant indemnify the County against law suits, lights and glare, noise, annual monitoring report, grading and geology, hazardous substances, hydrology, water quality, coastal resources, marine and terrestrial biology, transportation/circulation, bikeways, air quality, noise, cultural resources, aesthetics, public services and utilities, and recreation.

As submitted, the General Regulations do not require the submittal of critical information, such as geologic and soils engineering reports, archeological and paleontological surveys and mitigation plans, comprehensive drainage and water quality management plans, and hazardous material assessment reports at the time of a coastal development permit application so that this information can be analyzed and the necessary findings be made in the coastal development permit staff report. A specific example would be General Regulation 2.3.12, Regulation 37, which does not tie the loss of ESHA habitat with its replacement. Instead, grading in the Lowlands is tied to replacement of the raptor habitat on the Bolsa Chica Mesa. The Eucalyptus trees would be allowed to be removed but not replaced on the Huntington Mesa until grading is done in the Lowlands. Further, as previously explained in the Land Use Plan findings, the Appellate Court determined that the Eucalyptus Grove ESHA could not be destroyed and then recreated on the

Huntington Mesa. The Commission consequently modified the Land Use Plan to protect the Eucalyptus Grove ESHA in place. Based on the cited deficiencies, the "*General Regulations*" chapter is not in conformance with nor does not adequately carry out the certified Bolsa Chica Land Use Plan amendment as certified .

As originally submitted in June 1995, the Bolsa Chica LCP contained provisions for an optional Neighborhood Commercial District. The Neighborhood Commercial District is no longer proposed. Consequently, due to this changed circumstance references to the Neighborhood Commercial District are no longer appropriate. Based on this changed circumstance, the "*General Regulations*" chapter is not in conformance with nor does it adequately carry out the Bolsa Chica Land Use Plan amendment as certified.

Previously identified suggested modifications to the Land Use Plan amendment also make the General Regulations, as submitted, not in conformance with nor adequate to carry out the approved Bolsa Chica Land Use Plan as amended. Suggested modifications to the land use plan amendment include: restricting residential development to the mesa and limiting the number of units to 1,235, protection of Warner Avenue Pond, additional and more specific requirements pertaining to the control of urban runoff from development on the Mesa, maintenance and enhancement of water quality, coastal and marine resources through development design standards and implementation of new water quality management plan elements such as monitoring, and education, elimination of the EGGW Channel policies, changing the timing of submittal of required information to be tied to the filing of the coastal development permit application as opposed to the issuance of the building permit. Other General Regulations must be changed to incorporate the language of the applicable Land Use Plan policy. Based on the previously identified suggested modifications to the Land Use Plan amendment, the "*General Regulations*" chapter is not in conformance with nor does it adequately carry out the Bolsa Chica Land Use Plan amendment as certified.

b. Approved if Modified

To bring the "*General Regulations*" chapter into conformance with the Land Use Plan amendment this chapter must be modified to incorporate the 1,235 residential unit cap, to delete references to the optional Neighborhood Commercial Center, to require information necessary to evaluate the proposed development's potential impact on significant coastal resources to be submitted prior to the time a coastal development permit is filed as complete, to locate utilities underground so they will have minimal impacts on ESHA and public recreation, and to delete all references to Lowland residential development, and to incorporate specific development standards, and water quality management measures pertaining to the design of development and control of urban runoff, necessary to carry out the newly added and modified policies governing water quality and coastal and marine resources in the LUP as amended. Water Quality regulations also include requirements for the implementation of a water quality monitoring

plan, and homeowner education component. The water quality monitoring plan, is essential to ensure that the development is not causing or contributing to adverse impacts on coastal resources. Only if modified as stated herein and as specifically written in the "*Implementation Suggested Modifications*" section of this report is the Planned Community Program in conformance with and adequate to carry out the applicable policies of the Bolsa Chica Land Use Plan amendment as certified.

3. CONSERVATION PLANNING AREA REGULATIONS

a. Denial as Submitted

The Conservation Planning Area regulations implement the biological, marine, physical resource, cultural resource, and visual resource policies contained in the Resource Restoration and Conservation Component of the amended Land Use Plan. The Conservation Planning Area Regulations, as submitted, are not adequate for implementing the land use plan. The Conservation Planning Area Regulations incorrectly identify the Wetlands Restoration Program as the master Coastal Development Permit for the wetlands and would allow new development not compatible with the restoration of the wetlands.

The "*Purpose and Intent*" section states: ***"… the Bolsa Chica Wetlands Restoration Program, which serves as the Master Coastal Development Permit …".*** Section 10.2.3 of the Implementing Actions Programs identifies the Wetlands Restoration Program as **both** part of the implementation section of the Bolsa Chica Local Coastal Program **and** as the Master Coastal Development Permit for wetlands restoration. Section 5.5 of the Wetlands Restoration Program states that: "*Any amendment to the Wetlands Restoration Program shall be processed as an LCP amendment …".*

Since the State of California has acquired a large portion of the Bolsa Chica Lowlands and the landowner is no longer proposing residential development in the Lowlands, the "*Wetlands Restoration Program*" is no longer a relevant component to the Bolsa Chica LCP. As originally proposed, Lowland residential development was to have funded the "*Wetlands Restoration Program".* Since no residential development is now proposed and the State and Federal Governments are now working on a new restoration plan references to the existing plan must be deleted from the LCP. Therefore, all references to the "*Wetlands Restoration Program"* in the *"Conservation Planning Area Regulations"* must be removed.

Section 3.2 of the Implementing Actions Programs defines the principal permitted uses authorized. This section is deficient for two reasons. First, it does not designate a principal permitted use which is a necessary requirement for purposes of determining

appealability under Coastal Act Section 30603(a)(4). And second, it would allow, as a principally permitted use, construction activities within the Conservation area in support of residential development occurring outside of the Conservation area. This would have an adverse impact on ESHA if habitat values are disrupted as a consequence of construction for the benefit of residential development. For example, implementing regulations 3.2.1.6 and 3.2.1.7 would allow grading and infrastructure improvements associated with development outside of the conservation area to be done in the conservation area.

Moreover, allowing grading as a principal permitted use would be inconsistent with Policy 3.1.2.1 (as submitted) of the Resource Restoration and Conservation Components section of the Land Use Plan. Policy 3.1.2.1 (as submitted) states that: *"This land use district (zone) shall allow the restoration, creation, and protection of wetlands, ESHAs, and Buffers, as well as public access for wildlife interpretation, education, and scientific study."* Therefore, the Commission finds that the regulations cited above are not consistent and are inadequate to carry out the land use plan amendment as certified and must be modified.

Interim Conservation Management Regulations under Regulation 3.5 concern new development allowed until Conservation Planning Area 1D is dedicated or transferred to the County of Orange, State, or other County approved entity. The regulations under Section 3.5 do not require a coastal development permit for new development associated with an existing use and fail to clearly restrict new development to maintaining existing uses. New development, even if it is in support of existing uses, still requires a coastal development permit. Therefore, Regulation 3.5 must be modified to clearly state that new development must be approved through the coastal development permitting process. Existing oil production activities, however, would not trigger the requirement for a coastal development permit under a resolution of exemption issued by the Commission which is described below.

The Commission recognizes that Bolsa Chica has been and continues to be an oil producing area. Based on the prior use of the area for oil production, the Commission on May 17, 1973 approved a Resolution of Exemption (E-2-15-73-71) to allow oil production activities to continue. At the time the Commission approved this Resolution of Exemption, oil production was anticipated to end by 1993. The effect of this Resolution of Exemption is that some types of oil production facilities can be constructed without obtaining a coastal development permit. The bulk of exempted activity includes: construction, installation, repair, replacement, abandonment, and expansion of existing facilities.

Regulation 3.6.7 concerns uses allowed in buffer areas. This regulation, as submitted, lacks specificity concerning the land use designation associated with buffer areas and lacks important buffer criteria. Policy 3.1.2.12 (as revised through suggested modifications in the Land Use Plan) of the Wetlands/Biological Resource Policies requires

protective buffering between habitat areas and adjacent proposed residential development. This goal can only be achieved if the buffers areas are clearly identified as being located within the Conservation land use designation and if additional criteria is supplied how buffers are measured and what their width's would be to insure that they would protect existing wetland habitat from adjacent urban development by acting as a transition zone.

Therefore, the Commission finds that as submitted, the Conservation Planning Area Regulations are inconsistent and inadequate to implement the land use plan amendment as certified.

b. Approval as Modified

Since the State of California has acquired a large portion of the Bolsa Chica Lowlands and the landowner is no longer proposing residential development in the Lowlands, the "*Wetlands Restoration Program*" is no longer a relevant component to the Bolsa Chica LCP. As originally proposed, Lowland residential development was to have funded the "*Wetlands Restoration Program".* Since no residential development is now proposed and the State and Federal Governments are now working on a new restoration plan references to the existing plan must be deleted from the LCP. Therefore, all references to the "*Wetlands Restoration Program"* in the *"Conservation Planning Area Regulations"* shall be removed.

Regulation 3.2.1 which defines principal permitted uses has been reallocated between two regulations. Regulation 3.2.1 has been modified to define the principal permitted use within the land use designation of "*Conservation*" as being wetland creation, enhancement and restoration. Regulation 3.2.1 has also been modified to acknowledge that any development occurring in Edwards Thumb, Warner Avenue Pond, and the Eucalyptus Grove must be consistent with the "*Resource Restoration and Conservation"* policies of the LUP. The uses deleted from Regulation 3.2.1 have been moved to Regulation 3.2.2 as other permitted uses. Additionally the new regulations defining the other permitted uses have been modified to include language that the construction of facilities for public use of and maintenance of the wetlands shall not result in the fill of wetlands. Although the Coastal Act encourages the provision of new boating facilities and the wetlands will need periodic maintenance, there are other feasible less environmentally damaging alternatives than wetland fill to provide for these activities. The fill of wetlands in conjunction with these activities would be inconsistent with Section 30233 of the Coastal Act. Regulation 3.2.1.7 has been deleted since remedial grading to support off-site construction should not be a principal permitted use within the conservation area. However, a new regulation has been added which would allow landform alterations to the extent required to protect and enhance wetland and ESHA resource values.

Thus as modified, the Commission finds that the *"Conservation Planning Area Regulations"* of the Implementation Program to be consistent with and adequate to carry out the *"Resource Restoration and Conservation Components"* section of the Land Use Plan amendment as certified.

4. RECREATION PLANNING AREA REGULATIONS AND STANDARDS

a. Denial as Submitted

The Recreation Planning Area regulations and standards carry out the provisions of Chapter 4 of the LUP, Public Access/Visitor Serving Recreation. This chapter is also to be used within residential areas since park uses and certain commercial uses are allowed within Residential Planning Areas. As submitted the Recreation Planning Area Standards and Regulations do not conform to or adequately carry out the LUP policies as amended to be consistent with the applicable Coastal Act (and the California Code of Regulations) provisions that regulate development.

First and foremost the regulations allow multiple "*principal permitted uses*". For purposes of determining appealability, Coastal Act Section 30603(a)(4) requires the implementation program for unincorporated county areas to designate only one principal permitted use for all Planning Areas of the PC Program Development Map. The "*principal*" permitted use must be a single use. If a use is not the principal permitted use, then it is appealable to the Coastal Commission. Section 30603(a)(4) states:

> *Any development approved by a coastal county that is not designated as <u>the</u> principal permitted use under the zoning ordinance or zoning district map approved pursuant to Chapter 6 (commencing with Section 30500). (emphasis added).*

Secondly, the Recreation regulations cite the development standards for the General Development Plan and Resource Management Plan for the Harriet Wieder Regional Park (formerly the Bolsa Chica Regional Park). The Commission found in the Findings for Denial of the LUP as submitted that the County's 1992 General Development Plan and Resource Management plan for Bolsa Chica Regional Park is inconsistent with the public access and the cultural, visual, wetland and other ESHA resources protection policies of the Coastal Act. Therefore this Plan should not be relied upon to guide development within the Harriet Wieder Regional Park.

The Land Use Plan describes the proposed interpretive kayak/canoe facility as being located within the Full Tidal Conservation area within the Lowlands, opposite the proposed tidal inlet. Therefore to allow it as a principal or other permitted use in the

Recreation Planning Areas or Residential Planning Areas would not be in conformity with the LUP amendment as certified.

According to the Orange County Local Park Code it is possible to meet the local park land requirement with the provision of private park land. This would either allow the conversion of some or all of the Mesa Community Park to private park area to serve the residential community also planned on the Mesa or the Local Park Code provision could allow a reduction in the acreage of the public Mesa Community Park if the developer provides private park areas within the private residential community. Both these scenarios would result in non-conformance with the LUP amendment as certified "*Public Access/Visitor Recreation Component*".

b. Approval if Modified

In order to adequately carry out the "*Public Access/Visitor Recreation Component*" and the residential land use policies throughout the LUP the "*Recreation Planning Area Regulations and Standards*" must be modified to designate only one "*principal permitted use*". The remaining uses, if appropriate, then become "*other permitted uses*".

An example of a specific necessary modification to the listing of principally permitted uses is the allowance of "*community facilities*" in Recreation Planning Areas. Section 4.2.1.3 would allow community facilities per Section 6.2.1 of the PC Program. Section 6.2.1 spells out the allowable community facilities among them including private neighborhood parks, private recreation centers and facilities, security and maintenance facilities and structures, such as entry kiosks, and gates related directly to an individual residential project, homeowners association, or the community. These uses would be inappropriate within any recreation planning area as these are public areas. Therefore the allowance of "*community facilities*" as a principal permitted use or an allowable use, would not be in conformance with the applicable "*Public Access/Visitor Recreation Component*" policies of the Land Use Plan amendment as certified.

Because the Commission found in the findings for denial of the LUP that the "*Harriet Wieder Regional Park General Development Plan and Resource Management Plan*" (GDP) was inconsistent with the marine and land resources protection and the public access policies of the Coastal Act, the 1992 County GDP was not incorporated into the LUP as proposed. Therefore the PC Program regulations and standards should not reference this Plan in the development of the regional park. Therefore the references to the GDP must be deleted from the PC Program in order for it to conform to and carry out the LUP. However, as modified to incorporate the specific park design standards, signage and bicycle requirements of the applicable Land Use Plan recreation policies and to conform the timing of the dedication of park land as described in the "*Implementation Program Modifications,*" the "*Recreation Planning Area Regulations and Standards*" will be consistent with the LUP provisions and the Planned Community Program standards

and regulations be in conformity with and adequate to carry out the recreation and public access policies of the Land Use Plan amendment as certified.

Since the interpretive kayak/canoe facility was a component of the overall wetlands restoration program (which has been deleted) any regulation referencing this use shall be modified to delete the kayak/canoe facility.

Only as modified as stated herein and as specifically written in "*Implementation Program Modifications*" of this staff report is the Planned Community Program in conformance with and adequate to carry out the applicable LUP policies.

5. RESIDENTIAL PLANNING AREA REGULATIONS AND STANDARDS

a. Denial as Submitted

The "*Residential Planning Area Regulations and Standards*" suffer from the same problem as the "*Recreation Planning Area Regulations and Standards*" in that it lists multiple "*principal permitted uses*". As stated above, this is not in conformance with Section 30603(a)(4) of the Coastal Act and would result in uses inconsistent with the Planning Area designations of the LUP. For example, the Medium-Density Planning Area as submitted would allow community care facilities and local parks as principal permitted uses in addition to attached and detached single family residences. While community care facilities and local park uses would be compatible uses within the medium-density residential land use designation, allowing them as principal permitted uses would not be consistent with the intent of the Development Component of the Land Use Plan. Therefore this section of the PC Program must be modified to allow these uses in the residential area but as other permitted uses instead of the principal permitted use.

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The Residential Planning Area Regulations and Standards dictate the standards of Low Density Residential Development within the LCP area. The only areas which have a Low Density Residential designation area in the LCP as submitted are Planning Areas 10 and 11 which are located in the Bolsa Chica Lowlands. As detailed in the Chapter 3 Land Use Plan denial findings, residential development in the lowlands has been found to be inconsistent with Section 30233 of the Coastal Act in that it also involves fill of existing wetlands. Furthermore, the majority of the lowland area has now been acquired by the State of California for purposes of wetland restoration. Therefore it would follow that all of the Low Density Residential regulations and standards of this chapter must be deleted from the LCP since lowland residential development will not be occurring.

Additionally, Section 5.3.1.6 of the "*Residential Planning Area Regulations and Standards*" states that Accessory Permitted Uses referenced in Section 5.3.2 when located on a separate building site may be allowed as a principal permitted use. However, Section 5.3.2 does not reference any Accessory Permitted Uses. Accessory Permitted Uses are instead referenced in Section 5.3.3. Also, if an accessory use is located on a separate building site the accessory use cannot be considered a principal permitted use.

Finally, the "*Residential Planning Area Regulations and Standards*" also allow the Orange County Planning Commission or the Director, PDSD the discretion to approve any other uses in addition to those specified which the Commission or Director feels are consistent with the purpose and intent of the Residential Planning Area Regulations and Standards. As written this provision does not conform to or adequately carry out the policies and provisions of the Land Use Plan with regards to the development of the Residential Planning Areas. The Development Component of the LUP (Chapter 6) contains specific policies to ensure that the residential land use allowed over a significant portion, and at significant density on the Bolsa Chica Mesa, is consistent with the applicable Chapter 3 policies of the Coastal Act. Therefore, this provision in its current form is not in conformity with and adequate to carry out the Land Use Plan amendment as certified.

b. Approval if Modified

Only if the "*Residential Planning Area Regulations and Standards*" are tailored to comply with the Land Use Plan as modified by the Commission through suggested modification will this section of the Implementation Program be in conformance with and adequate to carry out the applicable LUP policies. This has been accomplished by designating only one principal permitted use; removing the Low Density residential standards from the Planned Community Program since it only applies to residential development within the lowlands which is being denied under the Conservation Planning Area Regulations and Standards, adding High Density residential standards, deleting regulation 5.5.4 which specifies Neighborhood Commercial Developments; and requiring that any other accessory use not specifically listed but approved at the discretion of the Director, PDSD not only be consistent with the purpose and intent of the PA regulations but that a finding be made that the use is also consistent with all applicable policies of the LCP.

Only as modified as stated herein and as specifically written in "*Implementation Program Modifications*" of this staff report is the Planned Community Program in conformance with and adequate to carry out the LUP amendment as certified.

6. PUBLIC FACILITIES REGULATIONS AND STANDARDS

a. Denial as Submitted

The purpose and intent of the "*Public Facilities Regulations and Standards*" section is to regulate those areas designated exclusively Public Facilities on the Planned Community (PC) Development Map and the East Garden Grove Wintersburg (EGGW) Flood Control Channel (PA4A) and a water reservoir site on the Bolsa Chica Mesa (PA4B). As submitted the LCP also includes a fire station (PA4C) and an 8-acre local park (3DR) within the Lowlands. The fire station is necessary to provide fire protection for the 900 homes that were proposed in the Lowlands at the time of submittal. The 8-acre local park is being provided to meet the local government park requirement which is also tied to the proposed 900 homes. The park would provide active uses such as playing fields and/or court game areas (tennis, basketball, etc.) and turf areas as well as passive use amenities. In the Land Use Plan findings the Commission found that the fill of wetlands for residential purposes was not an allowable use and deleted the proposed residential development from the Lowlands in the Land Use Plan. Consequently, the associated development such as the proposed fire station and local park also have to be deleted. To permit a fire station and a park within the Lowlands would not be in conformance with the Land Use Plan amendment as certified.

The "*Public Facilities Regulations and Standards*" section is also used for other public and community facilities within the Residential and Recreation Planning Areas. All public and community facilities will be subject to Coastal Development Permit requirements pursuant to the regulations of Chapter 10.

Section 6.2 of this chapter, as has been the case with other sections, has more than one principal permitted use. Consequently, as submitted, Section 6.2 must be modified to correctly identify only one "*principal*" permitted use for purposes of appeal as required by the Coastal Act. Other necessary modifications include the deletion of the regulations for lowland development since the majority of lowland has now been acquired by the State and lowland residential development is no longer proposed. Furthermore, those developments within the lowlands are not in conformance with the LUP amendment as certified since they were found to be inconsistent with the Coastal Act and were removed from the LUP.

As stated above, the Public Facilities Regulations and Standards are used for the development of public and "community" facilities within the designated Residential Planning Areas (PA), Recreation Planning Areas as well as the Public Facilities Planning Area pursuant to the Planned Community Development Map (**Figure 3** on page 5). A "*community*" facility is one that is a supporting or service land use which is appropriate or customarily provided within a community. As stated in the "*Purpose and Intent*" section of the Chapter, these community facilities must be evaluated and monitored to ensure compatibility with surrounding uses. Because the Bolsa Chica Mesa is to be developed primarily with private residential development, it is important to ensure that the public use areas are first, clearly separated from the private community as the Commission found in the Land Use Plan findings, and second, that the public and community facilities

associated with the private community do not adversely impact public access or public recreation opportunities, including visitor-serving commercial opportunities. As submitted the "*Public Facilities Regulations and Standards*" do not provide this protection of the public use area and is therefore not in conformance with and adequate to carry out the Land Use Plan amendment as certified.

As written Section 6.2.1 would allow private facilities such as private parks, private recreation centers and security facilities and gates related to residential projects in any Residential, Public Facilities or Recreation Planning Area as an other principal permitted use. These private facilities are wholly inappropriate in the Recreation PA and not in conformance with the policies of the Land Use Plan for the Recreation PA. These uses would also not be consistent with the purpose of the designated Public Facilities PA which specifically call for the development of a water reservoir on the Bolsa Chica Mesa and the continued use and upgrading of the EGGW Flood Control Channel.

These private community facilities may be permitted within the Residential PAs, along with the other listed facilities such as places of religious worship, schools and day care facilities, but not as principal permitted uses. As stated in the Purpose and Intent section of this Chapter, these facilities must be individually evaluated to ensure compatibility with surrounding uses. Some of these uses require a significantly greater number of parking spaces than the principal use of single and multiple family residential uses for which the Bolsa Chica Mesa is planned. The traffic impacts of these uses also differ from that of residential use. Thus there could be adverse impacts on the surrounding public uses. Therefore none of these community uses should be designated as the principal permitted use of any planning area. These uses may be listed as permitted uses within the Residential PA only.

The Site Development standards, section 6.3 states that permanent automatic irrigation facilities shall be provided for all landscaped areas. Permanent automatic irrigation facilities is not a compatible use within the wetland buffer areas. The landscaping within wetland buffer areas should be primarily native vegetation and other vegetation which is compatible with the viability of the adjacent wetland. This type of vegetation does not require permanent irrigation and permanent automatic irrigation may adversely impact the adjacent wetlands.

b. Approval if Modified

Only as modified as described above to remove the lowland fire station and 8-acre active and passive local park from the list of permitted facilities within the lowlands, to specify only one principal permitted public facility use for each of the Planning Areas, and to clarify that private "*community*" facilities shall not be allowed within Recreation Planning Areas is the Public Facilities Regulations and Standards chapter of the PC Program in conformance with and adequate to carry out the LUP amendment as certified.

7. OFF-STREET PARKING REGULATIONS

a. Denial as Submitted

The "*Purpose and Intent*" section of the "*Off-Street Parking Regulations*" states that they will result in parking facilities of sufficient capacity to manage traffic congestion, provide safe and convenient parking facilities for motorists and pedestrians and provide for shared or joint-use parking programs. The "*Purpose and Intent*" section does not include public coastal access as one of the goals of the program. The Chapter 4 policies of the LUP, the Public Access and Visitor-Serving Recreation Component, contains policies to ensure that adequate public parking facilities as well as bicycle parking and public transit opportunities are provided in order to maximize public recreation opportunities and public access to the coastal wetlands. Therefore as submitted the "*Off-Street Parking Regulations*" do not conform with and are not adequate to carry out the applicable policies of the LUP amendment as certified.

Section 7.5 are the regulations for exceptions or modifications to the parking requirements. It allows exceptions or modifications to the standards pursuant to a coastal development permit but only requires a finding that the exceptions or modifications are consistent with the purpose and intent of the chapter. As stated above, the "*Purpose and Intent*" section of the chapter does not include the goal of ensuring maximum public access and public recreation opportunities. Therefore as written the "*Off-Street Parking Regulations*" are not in conformance with or adequate to carry out the LUP amendment as certified.

b. Approval if Modified

Only if modified to establish that one of the goals of the off-street parking program is to facilitate public access and to modify the parking exceptions to ensure that no exception or modification will result in development inconsistent with the LCP is the Planned Community Program in conformance with and adequate to carry out the Land Use Plan amendment as certified.

8. SIGN REGULATIONS

a. Denied as Submitted

The "*Purpose and Intent*" section of the regulations state that they are intended to reflect positively on the design and aesthetics of the community and reinforce the concept of a

planned community. Chapter 4 of the LUP requires that the public be made aware of the public amenities and public recreation opportunities of the LCP area through a comprehensive signage program. However, the Purpose and Intent of these regulations is absent this Coastal Act and LUP goal. Similarly, Section 8.2.3, the regulations for sign programs, does not actually require a Sign Program be submitted and approved for any Planning Area (PA). However it states that if one seeks approval of a Sign Program for an entire PA, more than one PA or the entire Planned Community that it be processed either as a Master Coastal Development Permit or an Area-wide Coastal Development Permit, pursuant to requirements of Chapter 10, Discretionary Permits and Procedures. However a review of the Chapter 10 requirements for Master Coastal Development Permits and Area-wide Coastal Development Permits both indicate that Sign Program per Section 8.2.3 is an optional requirement. To ensure that a comprehensive signage program is prepared for all Recreation Planning Areas Section 8.2.3 must be modified. Therefore, as written the Sign Regulations are not in conformance with or adequate to carry out the LUP amendment as certified.

b. Approval if Modified

Only if modified to include within the "*Purpose and Intent*" section of the regulations the goal of making the public aware of the public recreation facilities of the LCP area and the opportunity for access to the coastal wetlands and to ensure that a Sign Program is required for the Recreation Planning Areas is the Sign Regulations of the PC Program in conformity with and to adequately carry out the LUP amendment as certified.

9. OIL PRODUCTION REGULATIONS

a. Denial as Submitted

The Oil Production Regulations, as submitted, are not adequate for implementing the land use plan. The Oil Production policies contained in the Land Use Plan require that oil production be managed to protect biological resources and that the area shall be restored in conformance with the Wetlands Restoration Program. However, since Lowland residential development has been eliminated through suggested modifications to the Land Use Plan, oil production policies that inter-relate with the proposed residential development must also be eliminated. Therefore, the Commission finds that the Oil Production Regulations as submitted are inconsistent with and not adequate to implement the Oil Production Policies of the Land Use Plan Amendment as certified.

b. Approval as Modified

Additional policies have been added to the Oil Production Regulations to bring this section into conformance with the Land Use Plan Amendment. A new regulation 9.4.5

has been added to specifically require that a site be restored when a well site is abandoned. Additionally, since Lowland residential development has been eliminated through suggested modifications to the Land Use Plan, oil production policies that inter-related with the proposed residential development have been deleted as they are no longer necessary. The effect of the these suggested modifications is to ensure that any new oil facilities that are allowed are fully consistent with the Land Use Plan provisions as certified. Thus, as modified, the Commission finds that the Oil Production Regulations of the Implementation Program to be consistent and adequate to carry out the Oil Production Polices of the Land Use Plan amendment as certified.

10.DISCRETIONARY PERMITS AND PROCEDURES

a. Denial as Submitted

The purpose of this chapter is to provide procedures on how Master Coastal Development Permits, Area-wide Coastal Development Permits, and Project Coastal Development Permits are to be processed and what types of development require one or more types of Coastal Development Permits and how Coastal Development Permits are processed. The chapter also establishes procedures to allow deviations from the Site Development standards of the various PA regulations. However, the Coastal Act does not provide for different types of coastal development permits. All development requires a coastal development permit and after certification of a LCP, any coastal development permit must be consistent with all provisions of the certified LCP.

Section 10.2.3 states that the Wetlands Restoration Program (WRP) is the Master Coastal Development Permit for all of the areas designated Conservation Planning Area on the Planned Community (PC) Development Map. However, throughout the LCP the WRP is described as being a component of the Implementation Plan portion of the Local Coastal Program. The LCP transmittal resolution of the Board of Supervisors states that the Bolsa Chica LCP is made up of the Land Use Plan (LUP), the Planned Community Program (PC Program) and the Wetlands Restoration Program (WRP). Although the WRP is written in much more detail than the typical LCP Implementation Plan, it can not be considered both a component of the LCP and a Coastal Development Permit. The procedures for application, processing by the Commission staff, and action by the Coastal Commission is different for LCP and regulatory matters. Also there are no procedures in the Coastal Act that allow the Coastal Commission to act on a Coastal Development Permit application in conjunction with certification of an Land Use Plan Amendment and the Implementation Plan. Subsequent to Coastal Commission certification of the LCP, the landowner of the Conservation PA can apply to the County of Orange for a Coastal Development Permit pursuant to the then certified LCP.

Section 10.2.3 also incorrectly states that an amendment to the WRP shall be processed as an amendment to a Coastal Development Permit. Since the WRP is part of the

Implementation Plan portion of the LCP, any amendments to it must be processed pursuant to the procedures for processing LCP amendments.

Section 10.2.4, as submitted, deals with the processing of Coastal Development Permits for Harriet Wieder Regional Park and states that a Master Coastal Development Permit or Area-wide Coastal Development Permit are not required given that the County of Orange has already approved a General Development Plan and Resource Management Plan for the regional park, As detailed in the Chapter 4 LUP denial findings, the 1992 GDP is inconsistent with the Coastal Act and is therefore not incorporated into the LUP. Therefore, a Coastal Development Permit shall be required for development of the regional park. Moreover, Section 10.2.4 has been modified to apply to all areas designated Open Space and Recreation.

Section 10.2.5 concerns the issuance of coastal development permits within recreation, residential and public facility planning areas. As submitted these policies applied to both the Mesa development area and the lowland development area. To bring the regulations of Section 10.2.5 into conformance with the changes made to the land use plan amendment these regulations have been modified to delete references to development in the lowland areas. Furthermore, Section 10.2.5 has been modified to apply only to residential and public facilities planning areas. To accommodate the deletion of "*recreation*" Section 10.2.4 has been modified to apply to all recreation areas.

Section 10.3, Contents of Applications as submitted is not in conformity with the LUP. The LUP requires consistency with Section 30253 of the Coastal Act with regards to assuring the geologic and structural integrity of new development and prohibiting new development that would require the construction of protective devices that would substantially alter natural landforms along bluffs and cliffs. As submitted the Coastal Development Permit provisions would permit the construction of significant development including master utilities and backbone infrastructure improvements and the mass grading of one or all Planning Areas without requiring the submittal of geologic study or soils engineering reports that could identify any hazards or make recommendations for mitigation of any adverse conditions. General Regulation Section 2.2.12 and 2.3.6 address grading plans and, as modified, require the submittal of geologic and soils engineering reports along with the submittal of a Coastal Development Permit application for grading activity. Section 10.3 therefore must be modified to include the requirement to submitted a detailed geologic study and soils engineering report at the time of CDP application.

A Coastal Development Permit is also required for the approval of the master roadway system, master utility system and master drainage/flood control system. The Coastal Development Permit may cover all or a portion of the PA. Because these provisions allow the construction of all the necessary infrastructure and roads to support the subsequent construction of the residential units there must be adequate information provided to the County at the CDP application stage in order to determine that the PA

can accommodate the planned level of development and thus whether the infrastructure has been properly sized. This is especially critical for the Bolsa Chica LCP area due to the presence of the Newport-Inglewood Fault which runs through the Bolsa Chica Mesa and the Lowlands. A 9-million gallon underground reservoir is planned to be located on the Bolsa Chica Mesa adjacent to Los Patos Avenue. Sewage and utility lines will also no doubt be within proximity to the earthquake fault to cause concern. Despite these facts the PC Program does not require the submission of geologic and soils engineering reports along with the CDP application.

Section 10.3.1.6 states that a Sign Program is optional. However the LUP Comprehensive and Local Park Implementation Plan policies require the approval of a comprehensive sign program for all Recreation Planning Areas. Therefore Section 10.3.1 is not in conformity with the LUP amendment as certified.

Additionally, as submitted the Area-wide CDP provisions do not conform to or adequately carry out the LUP. The provisions would allow the loss of environmentally sensitive habitat areas (ESHA) without mitigation and allow the approval of a CDP without proper geologic and soils engineering information.

As submitted, the CDP application for Residential Planning Area 6 must include a visitor-serving and neighborhood commercial area. As submitted the PC Program does not conform to the LUP because it does not require that these higher priority land uses be actually constructed and favors the residential development of this entire Planning Area. Since the LCP was submitted, the proposal for a neighborhood commercial center has been deleted from the project proposal. Also, as previously stated in the land use plan findings, lowland residential development was found not to be an allowable use. Therefore all regulations referencing either the commercial development or the lowland residential development must be removed the Planned Community Program to bring it into conformance with the land use plan amendment as certified.

Regulations 10.3.3 contains some sub-regulations which are not in conformance with the LUP in regards to information filing requirements which would allow the protection of public access, ensure geologic stability, protect water quality, and the preservation of ESHAs. Therefore Chapter 10 of the PC Program must be modified accordingly in order to bring it into conformity with and to adequately carry out the LUP amendment as certified.

Finally, as proposed there are no standards provided by which the approving authority could determine whether, consistent with constitutional principles, deprivation of all economic use would result from application of the conservation land use designation and zoning. Coastal Act Section 30010 prevents the Commission and the County of Orange from using their coastal permit authority to take or damage private property for public use.

The Commission notes in *Sierra Club v. California Coastal Commission* (1993) 12 Cal. App 4th 602 that questions of economic viability are usually not "ripe" for consideration until the regulating government agency (County of Orange in this case) is presented with a specific plan for development of a parcel. In general, this level of specificity does not arise until there is an actual permit application. Therefore, the Commission is not required to address economic viability issues in the Bolsa Chica LCP. In fact, the Sierra Club court said the Commission and local governments cannot use vague concerns about the potential for a taking as the basis for refusing to designate areas as environmentally sensitive habitat in a Local Coastal Program where these areas are environmentally sensitive within the meaning of the Coastal Act.

In addition, it is important to note that the land use plan at issue, on its face, permits a number of potentially reasonable uses of the property such as energy production, mineral extraction, and coastal-dependent industrial facilities. A taking by regulation does not occur until there is a deprivation of all economically viable use of the property. The fact that there are permissible uses in the Conservation district that seem to provide economically viable uses precludes the claim that designating the property Conservation will effect a taking of property. However, it is also noted that the Bolsa Chica LCP does present a unique situation. According to recent biological data, a few parcels in this area are almost completely covered by wetlands or ESHA. The owners of these wetlands have directly questioned whether the uses permitted in the conservation district will provide them with an economic use of their property.

Given the unique facts in this situation, the Commission finds that it would be appropriate to provide a mechanism for determining whether uses other than those specified in the conservation land use district should be permitted in order to ensure that property owners of lots almost entirely covered in wetland or ESHA have an economically viable use of their property. Requiring consideration of economic viability issues at the permit stage is consistent both with case law and with Section 30010 of the Coastal Act which prohibits both the Commission and local governments from using their coastal permit authority to take property.

b. Approval if Modified

Only if modified to incorporate the changes as specified above into the discretionary permits and procedures regulations will the Planned Community Program adequately carry out the applicable Land Use Plan policies. First modifications have been provided which clarify that all development requires a coastal development permit although the type of information that must be submitted in support of each type of proposed development may vary. Additionally, this section must be modified to delete references to the "*Wetlands Restoration Plan*" since this plan has been deleted from the Bolsa Chica LCP. Regulation 10.3.2.2 has been modified to require that a Water Quality Management Plan be submitted, to clarify that large scale projects require a mitigation

plan to offset adverse impacts, and that geotechnical reports analyzing any hazardous conditions be submitted. Regulation 10.3.2.5 has been deleted since the visitor serving commercial visitor facilities is no longer part of the Bolsa Chica LCP. The effect of the suggested modification to regulation 10.3.2.6 would clarify that any trails allowed within the lowlands must not involve the fill of any wetlands in addition to being compatible with the enhancement and preservation of wetlands.

As originally submitted in 1995, the County of Orange designated certain wetland and environmentally sensitive habitat areas for future residential development. The Commission, however, found that residential development in wetland and environmentally sensitive habitat areas was not an allowable form of development and designated these areas as Conservation. A potential side-effect of designating areas as Conservation is that landowners of legal lots which are predominantly wetland or ESHA may claim that application of the certified LCP would deprive the landowner of all economically viable use of his or her land. From the viewpoint of the landowner this raises the issue of when a government action results in a "*taking*". To address this potential concern, a new regulation 10.2.3 (Coastal Development Permits Within Conservation Planning areas) has been added. This new regulation establishes a process for determining whether an economically viable use exists consistent with the regulations of the Conservation land use district or if an alternative use that would otherwise be inconsistent with the uses allowed in the Conservation land use district must be allowed. This process also requires that when development is proposed that the project proponent review alternative economically viable uses that could be pursued on the property and for the project proponent disclose their economic expectation for the property. The decision making body, in this case the County of Orange, after reviewing the information would make a determination on if an economically viable use exists for the property within the context of the Conservation district or if another use, even though it was not an allowable use, should be allowed. If development not consistent with the Conservation land use district is allowed, this new regulation incorporates performance standards for assuring that the proposed development has minimal impacts on coastal resources.

Recent court cases have identified several factors that should be weighed when considering whether a government regulatory action constitutes a taking of property. For instance, in *Lucas v. South Carolina Coastal Council* (1992) S. Ct. 2886, the U.S. Supreme Court held that where a permit applicant has demonstrated that he or she has a sufficient real property interest in the property to allow the proposed project, and that project denial would deprive his or her property of all economically viable use, then denial of the project by the regulatory agency would result in a taking of the property unless the proposed project would constitute a nuisance under state law. These court decisions also suggest that the nature of the permit applicant's property interest and the reasonable investment-backed expectations of the property owner are relevant factors in determination whether a regulatory action would constitute a taking.

Based on these cases, the Commission's suggested process for ensuring that property owners will receive an economically viable use of their property requires property owners to provide the County with specific information about the economic factors affecting their property. For instance, the applicant for an economic viability determination would be asked to provide information relating to the costs of holding the property, as well as the facts surrounding their decision to invest in the property. Without such information, it would not be possible to determine either what level of economic return on the property is necessary to provide an economic use, or what were the property owner's reasonable investment-backed expectations.

It also is important in considering economic viability issues to properly define the relevant parcel for analysis. In particular, the cases in this area of the law indicate that discrete portions of property should not be set aside for analysis if they are part of a larger parcel. Prematurely severing the developable portions of the property from the areas that are subject to stricter regulation skews the economic viability analysis. It also limits the ability of regulating agencies to use planning mechanisms, such as transfers of development densities, to ensure that an economically viable use is provided for the entire parcel. For these reasons, factors such as ownership patterns, the degree of continuity, the dates of acquisition, and the extent to which the parcel or parcels have been treated as a single unit must be considered when making an economic viability determination. Therefore, the suggested modifications also would require applicants to provide the County with a total development plan for all their property, as well as information about the nature of their property interest, when they apply for an economic viability determination.

The suggested modifications also identify specific information to be submitted at the time of coastal development permit application. The required information submittal will allow the coastal development permit issuing agency to determine whether application of the LCP policies, provisions, and zoning would deprive a property owner of all economically viable use of his or her property. Without the information required in the suggested modifications, a definitive determination could not be made. Without a definitive determination wetland and ESHA protection is jeopardized, because some development may be allowed to adversely impact wetlands or ESHA that is not necessary to avoid a takings.

If an applicant demonstrates that denial of the project would deprive his or her property of all reasonable economic use, the County may be required to allow some development even where a Land Use Plan Policy or zoning standard would otherwise prohibit it. In complying with this requirement, however, a regulatory agency may deny a specific development proposal while indicating that a more modest alternative proposal could be approvable, and thus assure the property owner of some economically viable use. While applicants are entitled under Section 30010 to an economically viable use of their property, this section does not authorize the Commission or a certified local government to avoid application of the certified local coastal program altogether. Instead, the

Commission or a certified local government is only directed to avoid construing these policies in a way that would take property. Aside from this instruction, the Commission or a certified local government is still otherwise directed to enforce the requirements of the certified LCP. Therefore, in this situation, the Commission and certified local government must comply with Sections 30233 and 30240 land use policies and zoning standards by protecting wetlands and ESHA on the remainder of the applicant's property, and avoiding impacts which would degrade the wetland and ESHA, to the extent this can be done without taking the property. Therefore, the Commission finds that the Coastal Conservation zoning must include development standards which are applicable when an applicant for a coastal development permit can demonstrate that he or she has a sufficient real property interest and denial of the proposed project based on application of the certified LCP would deprive an applicant of all economically viable use.

The suggested modifications specifically include the following:

- Modifying the requirements for coastal development permits within Conservation Land Use Districts to require an overall development plan, providing wetland and ESHA studies and alternatives analysis at the time of coastal development permit application, requiring permanent preservation of wetland and ESHA areas, and prohibiting further subdivision of parcels containing wetlands and/or ESHA;

- Adding new text to require specific information at the time of the coastal development permit application if the property owner contends that the uses provided for in the Coastal Conservation district are not economically viable;

- Adding new text which specifies the findings that must be made if deprivation of all economic use is determined;

- Adding new text to provide allowable uses and development standards if deprivation of all economic use is determined.

Thus, as modified, the Commission finds that the Discretionary Permits and Procedures section of the Implementation Program to be consistent and adequate to carry out the polices of the Land Use Plan amendment as certified.

11.DEVELOPMENT MAP AND STATISTICAL TABLE REGULATIONS AND PROCEDURES

a. Denial as Submitted

The purpose and intent of this chapter is to provide procedures to make changes to the Planned Community (PC) Development Map and PC Statistical Table which are likely to

change due to more detailed engineering and site planning as subdivision maps are prepared and the roads are engineered. As submitted, changes that are not consistent with the General Regulations would be processed as set forth in the Orange County Zoning Code Section 7-9-150.3, "*Planning Commission*". However Coastal Act Section 30514 requires that amendment to any portion of the Implementation Plan in terms of the type, location or intensity of land use, shall constitute an LCP amendment. This Coastal Act requirement would therefore include changes to the PC Development Map or the PC Statistical Summary as they are part of the LCP Implementation Plan. Therefore, as submitted, the regulations contained in Section 11.1.2 of the Planned Community Program are inconsistent with the Coastal Act Section 30514 as to what constitutes an LCP amendment. Thus a change to the PC Development Map or PC Statistical Summary, over and above that allowed in Section 2.2.3 of the General Regulations, would require an LCP amendment.

Sections 11.4.1 through 11.4.6 deals with procedures for revisions to the PC Development Map and PC Statistical Table. As submitted they are not in conformance with the LUP. As written the regulations would allow changes that may be inconsistent with LUP policies. For example, Section 11.4.1 requires revisions to be consistent with the PC Zoning Map. However the PC Zoning Map zones the entire area PC(CD)(O)(SR)(PD). The corresponding zones are Planned Community, Coastal District Overlay, Oil District Overlay, Sign Restriction Overlay and Planned Development Overlay. Therefore, Chapter 11 of the Planned Community Program must be modified accordingly in order to bring it into conformity with and to adequately carry out the LUP amendment as certified.

b. Approval if Modified

Only if modified to incorporate the changes as specified above will the Planned Community Program conform with the applicable LUP policies and be adequate to carry out the LUP amendment as certified. As modified, the Planned Community Program will also be consistent with the Coastal Act with regards to requirements for LCP amendments when significant changes are made to the Planned Community Development Map and Planned Community Statistical Table.

12.DEFINITIONS

Some of the definitions contained in the Planned Community Program have been revised to bring them into conformance with the definitions contained in the Land Use Plan amendment. The Commission finds, that as modified, the Planned Community Program definitions are adequate to carry out the provisions of the Land Use Plan amendment as certified.

B. WETLANDS RESTORATION PROGRAM

The Wetlands Restoration Program, as submitted, is not adequate for implementing the Land Use Plan amendment as submitted. The Commission, in reviewing the amended Land Use Plan found that fill of wetlands for residential development was not an allowable use and made suggested modifications to policies affecting wetlands, biological resources, environmentally sensitive habitat areas, and the tidal inlet. Normally these suggested modifications would be incorporated into the Wetlands Restoration Program. However, in this case the entire Wetlands Restoration Program was to be funded by the developer through proposed Lowland residential development which has been denied. Further, the State of California has now acquired the property and the Ports of Long Beach and Los Angeles propose to fund the restoration program. Consequently the Wetland Restoration Program is deleted from the Bolsa Chica Local Coastal Program for the following reasons.

With acquisition of the Lowlands by the State, a new wetlands restoration plan is being prepared which will include the areas of the Lowlands where the Hearthside Homes had previously proposed residential development. This area will now be included in the new wetlands restoration plan and the amount of restored full tidal area may be increased. The state tidelands will be governed by the Chapter 3 policies of the Coastal Act and not the provisions of this certified LCP. In any event, the "*Wetlands Restoration Program*" submitted as part of the LCP is not consistent with the Land Use Plan provisions. Therefore, the Commission concludes that the "*Wetlands Restoration Program*" (including any references to the East Garden Grove Wintersburg Channel in other portions of the LCP) should be deleted in its entirety.

C. BOLSA CHICA DEVELOPMENT AGREEMENT

As with the "*Wetlands Restoration Program*", the Commission found that, as submitted, the Development Agreement was not adequate to implement the Bolsa Chica Land Use Plan as amended. At the January 11, 1996 Commission meeting, the Commission proposed suggested modifications to the Bolsa Chica Development agreement between the County of Orange and Koll Real Estate Group (now Hearthside Homes). The suggested modifications related primarily to the obligations that Hearthside Homes would incur if the company failed to pursue a Section 404 permit from the U.S. Army Corps of Engineers for lowland residential development. Since the Commission's initial certification, the lowland area was sold by Hearthside Homes to the State of California and residential development in the Lowland is no longer permitted in the LCP. The State of California is now proposing that the Lowland area, including the area that was to contain residential development under the LCP as submitted, be restored. Consequently, the proposed suggested modifications to the development agreement are no longer applicable and have not been included in this document. Since Lowland residential

development is no longer proposed, the County of Orange is no longer including the Development Agreement as part of the implementation program for the Bolsa Chica LCP. Through a letter (Exhibit 10) dated November 29, 1999 the County formally withdrew the Development Agreement from the Bolsa Chica LCP. Based on this changed circumstance the Commission hereby deletes the Development Agreement from the Bolsa Chica LCP.

X. CONSISTENCY WITH THE CALIFORNIA ENVIRONMENTAL QUALITY ACT

Section 21080.5 of the California Environmental Quality Act (CEQA) exempts local governments from the requirement of preparing an environmental impact report (EIR) in connection with a local coastal program (LCP). Instead, the CEQA responsibilities are assigned to the Coastal Commission. Additionally, the Commission's Local Coastal Program review and approval procedures have been found by the Resources Agency to be functionally equivalent to the environmental review process. Thus, under Section 21080.5 of CEQA, the Commission is relieved of the responsibility to prepare an environmental impact report for each local coastal program submitted for Commission review and approval. Nevertheless, the Commission is required when approving a local coastal program to find that the local coastal program does conform with the applicable provisions of CEQA.

As stated above, the County of Orange's Bolsa Chica Land Use Plan Amendment No. 1-95/Implementing Actions Program consists of a Land Use Plan (LUP) amendment and an a new Implementation Plan (IP). The Commission incorporates its findings on Coastal Act and land use plan conformity at this point as it set forth in full.

The Land Use Plan amendment as originally submitted raises a number of concerns regarding the Chapter 3 policies of the Coastal Act and thus cannot be found to be consistent with and adequate to carry out the Chapter 3 policies of the Coastal Act. The Land Use Plan amendment, as submitted, is not adequate to carry out and is not in conformity with the policies of Chapter 3 of the Coastal Act with respect to: residential development in a wetland, development setback on the Bolsa Chica Mesa, ESHA protection, monitoring changes to shoreline processes, public recreation, public access, hazards, water quality, visual impacts, oil production, and cultural resources.

The Commission, therefore, has suggested modifications to bring the Land Use Plan amendment into full conformance with the requirements of the Coastal Act. Specifically, the Commission's certification provides for: the elimination of residential use in the lowlands, preservation of the lower bench of the Bolsa Chica Mesa, preservation of ESHAs such as Warner Pond and the Eucalyptus grove, that the public be informed of the public amenities located at Bolsa Chica, that landform alteration be minimized, that

water quality be preserved, and a requirement that cultural resource studies be completed and submitted as part of application process for a Coastal Development Permit. As modified, the Commission finds that approval of the Land Use Plan amendment will not result in significant adverse environmental impacts under the meaning of the California Environmental Quality Act.

Further, the Commission finds that approval of the Implementation Program with the incorporation of the suggested modifications to implement the Land Use Plan would not result in significant adverse environmental impacts under the meaning of CEQA. Absent the incorporation of these suggested modifications to effectively mitigate potential resource impacts, such a finding could not be made.

Specifically, the Implementation Plan, as modified, would maximize protection of environmentally sensitive habitat areas through design controls, minimize public safety risks and geological instability through standards for development on bluff tops, preserve and protect scenic visual resources through standards for landform alteration, minimize impacts to cultural and paleontological resources, promote visitor serving commercial opportunities through a signage program and design standards, protect water quality through the incorporation of specific development standards and management measures pertaining to the design of development and the control of urban runoff, and assure continued public access through the creation of a bluff top park and the provision of adequate parking.

Given the proposed mitigation measures, the Commission finds that the Bolsa Chica Local Coastal Program, as modified, will not result in significant unmitigated adverse environmental impacts under the meaning of the CEQA. Further, future individual projects would require coastal development permits, issued by the County of Orange or, in the case of areas of original jurisdiction, by the Coastal Commission. Throughout the coastal zone, specific impacts associated with individual development projects are assessed through the CEQA environmental review process; thus, an individual project's compliance with CEQA would be assured. Therefore, the Commission finds that there are no other feasible alternatives or mitigation measures under the meaning of CEQA which would further reduce the potential for significant adverse environmental impacts.